





THE GARDEN CITY



Houses near Norton Common

THE GARDEN CITY

A STUDY IN THE DEVELOPMENT
OF A MODERN TOWN

BY C. B. PURDOM

WITH 4 COLOURED PICTURES
BY T. FRIEDENSEN AND 140
OTHER ILLUSTRATIONS



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PREFACE

IT is ten years ago this month since the making of the Garden City of Letchworth was begun, and the writing of this book is an endeavour to give an account of the building of the town and to restate the original ideas that brought it into being. Unlike almost all modern towns in England and abroad, the Garden City was not founded by some accident or for those merely commercial reasons peculiar to this age. It was founded like the old towns were founded—consciously, purposely, and for definite ends. It was designed with the object of showing that the development of the towns of England need not be left to chance or to the mercy of speculators, and with the further object of making town life tolerable to people who have come to hate it not merely as William Morris hated it because of its ugliness and grime, but because it is a menace to the vitality of the race. The aim of those who have established the Garden City has been to defeat the evils inherent in all great cities by an attempt to revive the small town under twentieth-century conditions. The significance of the new town, so far as the home, manufacture, and agriculture and all the things bound up with them are concerned, is the subject of this book.

I have tried to set down something of the romance that belongs to what may be regarded as an adventurous endeavour to create a new thing in English life, and I have tried to interpret the town to those who know it merely by name. Garden City is not to be confused with the new suburbs or town-planning schemes, or even with the familiar model village. It is something quite different from them all. I have called the book *THE GARDEN CITY*, and employed it as the name of the town, though its official and better

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name is the old one of Letchworth, because I wished to emphasise the town's uniqueness.

It has not seemed necessary or desirable in the first account of the Garden City to take up a too exclusively critical attitude. In the face of prevailing misconceptions regarding the town, the first thing that was needed was an exposition of the aims of its promoters, and that, I hope, this book supplies. I have not, however, avoided criticism any more than I have hesitated to praise. There are many matters of varying importance on which I have no more than touched, and of which, I am well aware, my treatment has been very inadequate, but within the necessary limits the book is as complete as it could be made. I hardly need to add that it is in no sense official, and that for the opinions expressed in its pages (with the exception of the signed parts of the appendix, which, however, I have edited) I alone am responsible.

My thanks are due to all who have helped me in the preparation of the book ; to those who took the photographs for me, to those who have contributed to the appendix, to the friend who read the proofs, and particularly to my wife for help of many kinds.

C. B. PURDOM.

LEITCHWORTH,

October 1, 1913.

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THE GARDEN CITY

CHAPTER I

ON THE ORIGINS OF GARDEN CITY (I.)

"My thoughts were thus necessarily directed to the great defects of all existing towns, and the desirability of forming at least one model town, which should avoid the most prominent of these defects, and substitute advantages not yet possessed by any."—JAMES SILK BUCKINGHAM, *National Evils and Practical Remedies*, 1849.

I

FOR defence, for entertainment, for trade, and for religion the town has at all times been the centre to which the roads led and to which men's eyes were directed. Civilisation had its birth in towns, and in towns the arts and sciences were first invented. In towns, also, commerce arose, and it was the towns that made politics and society and out of separate men created the thing called a democracy. Whenever men have been free they have been free in towns, and wherever the towns are strong the country is prosperous.

Of all noble things that men have imagined the town is the noblest, and yet no town that was ever built has satisfied the soul. The finest energies of man have gone to their building, but there are few that men would not wish to build over again. The life of every town is thus a continual change, a constant pulling down and building afresh, and it might even be said that of all the arts that of town-building is the least permanent.

Men have always dreamt of cities that would not change, that would endure because they were completely satisfying. From Plato and the man who saw the city "descending out of heaven from God" to St. Augustine's *De Civitate Dei*, from Sir Thomas More and Campanella's *City of the Sun* to the day before yesterday, when the latest idealist described the city of to-morrow, men have imagined some beautiful and well governed city in which they could live the whole term of their lives in happiness and peace.

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II

At no time have the towns played a more important part in the lives of men than they do to-day, and at no time has the problem of the town been so surely the main problem of civilisation. For good or ill the modern world is made up of townsmen. In every civilised country the towns are increasing in size and importance; the old rural life which a little more than a century ago was the common condition of Englishmen, and is still enjoyed in some countries of the world, is everywhere giving way, where it has not already given way, to town life. And, so far as can be seen, there is no evidence of this tendency coming to an end. The last English census returns show that, while the populations of the central areas of the great towns are in some cases not increasing—are, indeed, sometimes even diminishing—yet the towns are extending their boundaries, and what appears at first sight to be a check upon the flow of people from the rural districts is but the result of the further encroachment of the towns upon those districts. “The growth of large urban communities can only be measured by considering jointly the population of the central area and of all its suburbs, whether the latter do or do not happen to be under the same local government as the central area” (*Census of England and Wales*, vol. i. p. xxii).

This influence of the towns over the country and countrymen, so much deplored in our day, is no new thing. In Elizabethan England we find John Stow lamenting that the people “do leave the country towns where there is no vent, and fly to London.” And with the growth of facilities for travel, with the multiplication of social attractions, and with manifold economic changes, the power of the towns increased. It was not, however, until the close of the eighteenth century in England that certain industrial developments, and certain changes in agricultural methods, made the towns supreme.

Up to that time the bulk of industry was domestic; more than half the population was still in touch with agriculture, and a large proportion had some property in the land. With the end

On the Origins of Garden City

of the century domestic industry had vanished ; the people, denuded of their ancient rights, were being swept from the villages, and the making of the great towns of the midlands and the north was begun.

It is not our intention to discuss here the economic forces which brought about this great change. It is sufficient to remind ourselves once more that their operation, while bringing wealth to a few, was accompanied by an impoverishment of the mass of the people, and laid the foundation of those evils which the nineteenth century attempted to remove by social reform. The pursuit of wealth, which absorbed the whole interest of the commercial and land-owning classes, was carried on without regard to the condition of the people. If they were thought of at all it was in connection with means to increase their servility, " that subordination of the lower ranks of society which in the present times is so much wanted," as a contemporary record expresses it.

Under such circumstances the great industrial towns arose, and with them the face of the country and the habits, lives, and traditions of the people changed. With them also arose the peculiar problems of the nineteenth century, among which the housing problem is one of the chief. There had always been a housing problem since men first made houses, but it was not until the building of the industrial towns that it reached dimensions which made it the most serious menace to the vitality of the race that society has known. There is no need to elaborate upon the ill effects, or upon the extent and viciousness of the problem ; it has been done so many times before. The report of the Royal Commission of 1834 and Edwin Chadwick's investigations contained in his *Report on the Sanitary Condition of the Labouring Classes in Great Britain* were the commencement of a series of disclosures as to the condition of the people in their homes which resulted in the beginning of modern sanitary science ; and although much has been done since then by Housing and Public Health Acts and by voluntary effort to improve the health of towns, the reports of Royal Commissions and Parliamentary Committees, together with newspaper articles and public discussion, show that the housing of the people is still so bad that it is a scandal to our civilisation.

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III

What is infinitely worse, however, than the picture of nineteenth-century England is the reflection that the bad building of the past is being maintained to-day. Everywhere in the civilised world towns are being extended and new towns are arising, and are preparing again the foundations from which will spring terrible evils for the future. We have not yet properly learnt that in building for the new century we must not build for times that are gone. The towns of the nineteenth century were the product of wild and reckless adventure which had nothing in view but immediate material gain. All the things for which we care so much, science, education, and physical fitness, were unknown or ignored. The fact is that the extraordinary increase in population and the rapid growth of the towns took the men of the last century by surprise. The industrial revolution was upon them and they were suffering from its evils, all in a few amazing years. To-day we have not their excuse. We have sciences and arts that they lacked. We have all the lessons of past years plainly before us ; we have a more intelligent grasp of the problems to be overcome and better equipment in every possible way to deal with them ; we at least are able if we will to build towns that are not " blotches of hideousness." We are able to do this, but unless we take care it will not be done ; for we are still going on in our town-making in the old unhappy way. To show how it could be done, to show how modern knowledge could make a new kind of town when directed (in the words of William Morris) " towards the promotion of decency of life," the Garden City was founded.

IV

It is as the culmination of a movement which had its birth when the industrial towns were first built and the evils inherent in them were first discovered that the Garden City is to be considered. It was no sudden invention. It did not owe its origin to the whim

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or fancy of a few enthusiasts. The fruitful idea of it and the desire for it are to be seen in the very early years of the last century. With the rise of modern industrial England tentative suggestions for the building of a town fit for the altering conditions of the times were made. Those suggestions are to be distinguished from the Utopias and imaginary cities of the satirists. Bellamy, Butler, and Morris in the nineteenth century, like More and Swift in the sixteenth and eighteenth, wrote of impossible and unrealisable conditions as a method of criticism upon the things that were. But the practical proposals put forward in England in the last century were of an altogether different kind. They could not have been made in an earlier age. They were intended to be carried out, and in some cases actual attempts were made to give effect to them. They are worthy of attention because they show the anticipatory elements in the spirit and needs of the times which, gathered up by one man at the close of the century, constituted a proposal of complete practicability which in the opening years of the new century was realised in a successful experiment.

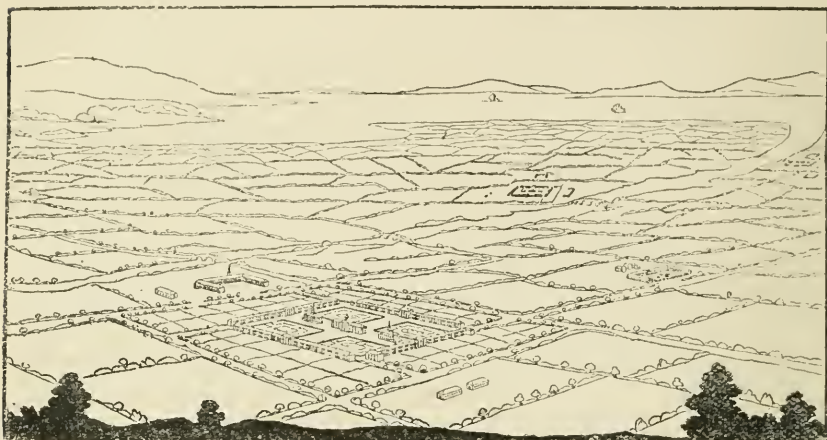
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ROBERT OWEN'S SCHEME

The first of these early proposals was made by that man of many activities, Robert Owen, who in 1818, in a Report to the Committee of the Association for the Relief of the Manufacturing and Labouring Poor, proposed the formation of small village communities of 1200 persons, for the relief of the overcrowded towns. Twelve hundred acres of land were to be bought at £30 per acre, and the communities were to be organised "by individuals, by parishes, by counties, by districts, and by the government." Many highly-placed people were interested in this as in other proposals of this remarkable man. He asked for a quarter of a million of money to carry out the scheme, but at last was induced to make a beginning with £50,000, to which amount he himself heavily subscribed. The first village was begun at Orbiston, near Motherwell, in 1820; but owing to dissensions

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among the promoters, and to other causes, it did not proceed very far, and in 1828 it came to an end. Owen based his proposals partly on some suggestions put forward by John Bellers, a prominent

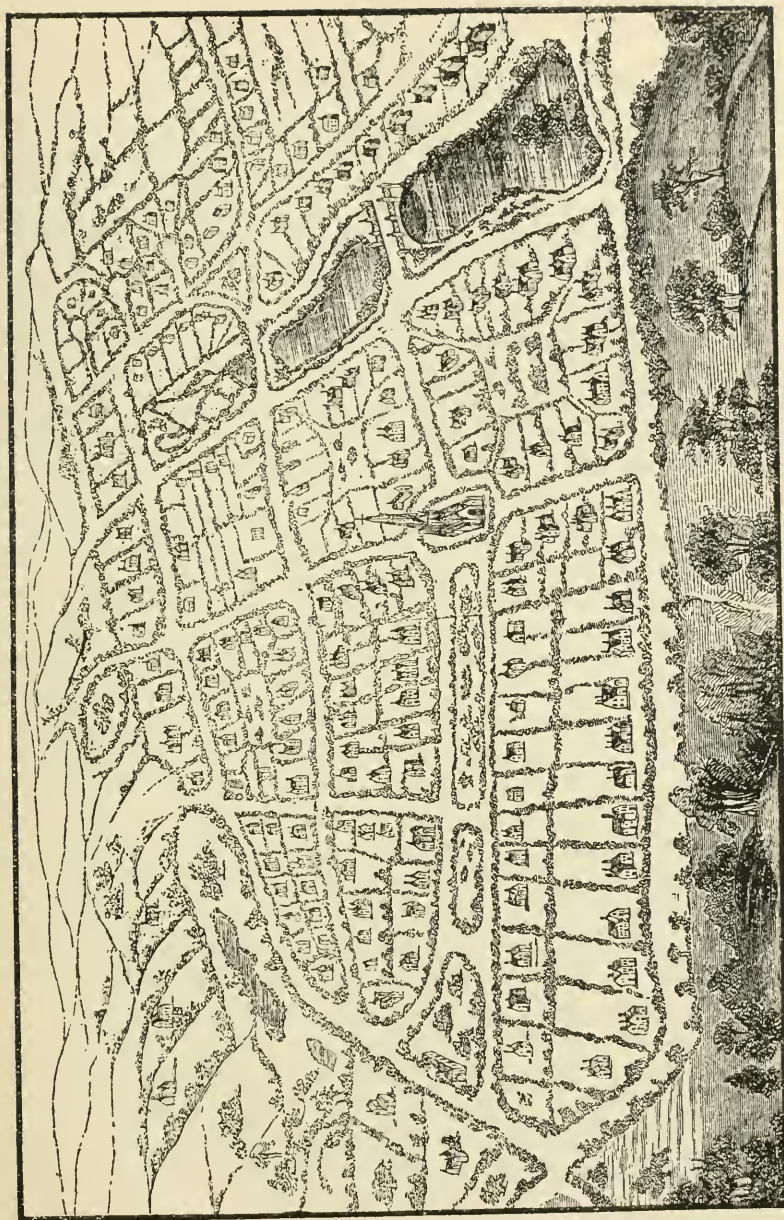


Robert Owen's Plan of the Agricultural and Manufacturing Villages of "Unity" and "Mutual Co-operation" (1818).

Quaker, in a pamphlet published in London in 1695, entitled *Proposals for raising a College of Industry for all useful Trades and Husbandry, with profit for the Rich, and plentiful living for the Poor, and a good Education for Youth. Which will be an advantage to the Government, by the Increase of the People and their Riches.*

THE VILLAGE ASSOCIATIONS

In the early part of the century building societies were particularly active, and many small estates were developed by them. Endeavours were made to extend their operations, and in September 1845, a Mr. Moffatt, an architect of London, proposed to form an association for the erection of villages within four to ten miles of the metropolis. The scheme was a most comprehensive one, involving the housing of 350,000 people at a total expenditure of ten millions. It was not, however, proceeded with, and the



Plan of the Proposed Village at Ilford, Essex (1848)

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details of it are lost. A further attempt on a more modest scale was made three years later, when an association with a capital of £250,000 in £5 shares was proposed, with the object of building a residential village of from 5000 to 6000 people near Ilford station in Essex. Tait's *Edinburgh Magazine* (December 1848), from which the particulars given here are taken, describes the leading features of the scheme: "Air and space, wood and water, schools and churches, shrubberies and gardens, around pretty self-contained cottages, in a group neither too large to deprive it of a country character, nor too small to diminish the probabilities of social intercourse." Three classes of houses were contemplated: the rents of the first to be £40 per annum, of the second £30, and of the third from £12 10s. to £18. These rents were to include respectively a first, second, or third class season ticket to London by the Eastern Counties Railway. The promoters were to provide facilities for the tenants to purchase their houses by shares or by instalments. They were, indeed, a building society on a large scale, "with the advantage of acting out their schemes without annoyance or interference by less perfect plans of other builders, and with all the advantage that science or capital affords." Gas and water were to be supplied by the association, and the drainage "will be perfect from the first." Spaces were to be left for churches, halls, schools, and open spaces "so far as can be possibly requisite." Poor rates, it was stated, would be very light. The objection was raised that the village, which was to be started as an experiment and be followed by others if successful, would only remove the best classes of artisans and others out of large towns "and keep the poorer still pressed together in damp, close, unhealthy dwellings," but, says the writer, these classes "deserve to have their interests consulted. They are not the world's drones. They do not live on society, but society rests on them. They are the main pillars of the fabric, who should be fastened and clinched into the state by every nail that we can legitimately drive and rivet." If they are drawn out of the old towns, "the pressure is lightened, rents are reduced, and better houses remain to be possessed by those who cannot follow them."

The writer in the magazine regards the proposal with optimism :

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" We need not, therefore, despair of seeing every large town, within a circle of miles around its present suburbs, surrounded with new suburbs, abounding with all the advantages of towns and all the attractions of country life. The scheme involves the most important revolution that can be suggested in this country. A scheme for economising health, life, morals, and money should not want advocates ; it will not want opponents. If the dungeons rented high in large towns would not let, they would soon be destroyed. If tenants were in circumstances to demand the changes necessary to make a good residence, they would be speedily obtained ; and we should then have fewer of those fever and cholera enemies that, in one shape or another, cut down more of our population yearly and untimeously than ever did the fiercest wars in which the blood of the nation was freely and often needlessly shed."

The present writer has not been able to find any evidence that the proposal matured, and although Ilford is now one of the largest and most populous urban districts near London, the multiplication of Ilfords to-day is not so desirable a thing as it might have been had the proposal of 1848 been effective in making it the first Garden Village.

BUCKINGHAM'S SCHEME

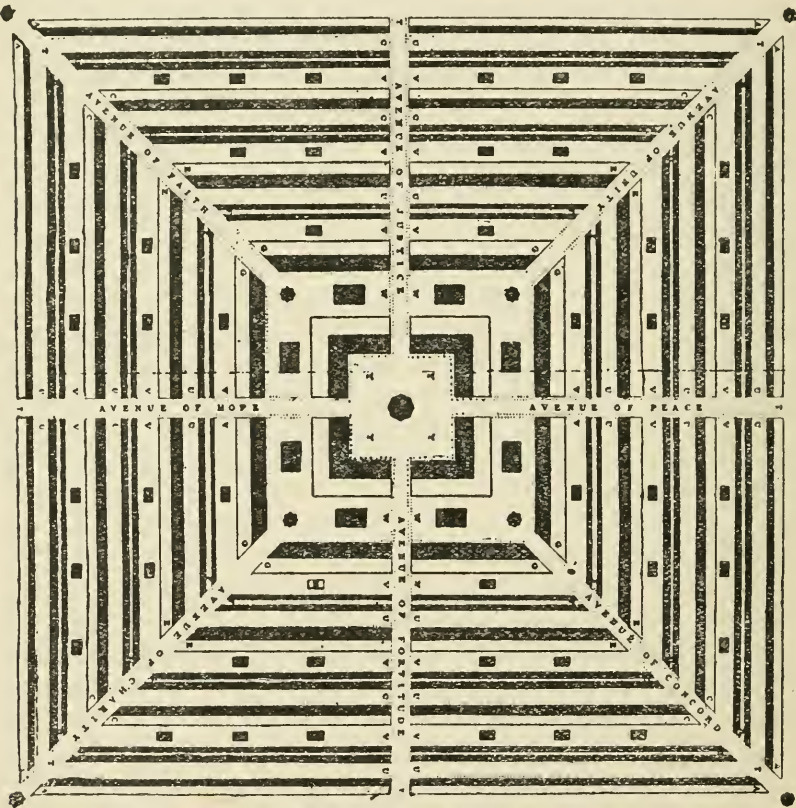
Some time in 1849 there was published a book entitled *National Evils and Practical Remedies*,¹ which recommended " the great principle of associated labour, skill, and capital " for the building of a model town as a means of absorbing the unemployed community. Its author was James Silk Buckingham, a many-sided reformer and a characteristic nineteenth-century idealist. He was a great traveller and a strenuous advocate of peace, free trade, temperance, public libraries, and the abolition of slavery. Among other things he established the *Athenæum* newspaper, and was member of Parliament for Sheffield.

Buckingham's scheme may be briefly summarised as follows : A " Model-Town Association " was to be formed and incorporated

¹ London, Peter Jackson, St. Martin's-le-Grand, p. 512.

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by Royal Charter or Act of Parliament, in order to limit the liability of the promoters. The undertaking was to be a private venture without any assistance from the government. Its object was the purchase of 10,000 acres of land, on 1000 acres of which a town



James Silk Buckingham's Plan of the Model Town "Victoria" (1849).

of 10,000 inhabitants was to be erected and named "Victoria," after the young queen. The town was to be planned beforehand, and to provide for factories and private dwellings, the rents of the latter to be from £5 to £300 per annum. All the buildings were to be the property of the company, which would also own and manage the factories and the agricultural estate of 9000 acres

On the Origins of Garden City

which was to surround the town, being thus sole landowner and employer: a rather curious element, by the way, in a scheme which was designed to "avoid the evils of communism." The industries were to observe an eight-hours' day, and wages were to be paid according to a fixed scale. There was to be no overcrowding; medical service, nurses for children, and education were to be free; and there were to be public baths, public kitchens, and laundries. Also, and this was one of the fads of the man, no intoxicants, weapons of war, or tobacco were to be allowed. The company was to have a capital of £3,000,000 divided into shares of £20 each. £1,000,000 of the capital was to be employed in industry and agriculture. Dividends were to be paid out of profits only and limited to 10 per cent. Persons not resident in the town could invest in the company, but all inhabitants were to hold at least one share, to be paid for, if necessary, by instalments. And, finally, after dividends had been paid and all necessary reserves provided for, the balance of the profits was to be divided proportionally among the active resident members of the company.

The design of the projected town, of which a plan and a drawing in perspective were given in the book, was square in shape. The outer square comprised 1000 houses and gardens, a second square contained a covered arcade for workshops, and smaller squares were arranged towards the centre, where the more expensive houses and the public buildings were to be placed. The manufactories were to be "established nearest the outer edge of the town so as to place the labouring portion of the population in the full enjoyment of the open air."

That a proposal so well worked out as this was by Buckingham should have come to nothing is explained partly by what is known of the man himself, and partly by the fact that Englishmen are seldom attracted by merely theoretical and experimental proposals, unless they are bound up with an element of speculation and the possibility of unlimited profits. Another and more effective reason was that at no time in our history was there more complete indifference to the evils of insanitary towns and the conditions of the labouring population than when Buckingham wrote. The *Dictionary of National Biography* says of him: "He was a man of great kindness

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of heart and liberality of opinion, a fluent speaker, and possessed of a lively imagination. Though by no means deficient in industry, and always careful to keep himself well before the public, he was capricious in his work and had too many schemes in hand at the same time. To this cause may probably be attributed his want of success in life."

The reforming instinct of Buckingham had, it is needless to say, a large area to work upon in evolving such a scheme, but when the awful conditions of the time are considered and the counsels of despair that prevailed, the wonder is that the book is so practical and contains so little of the fantastic and absurd. Criticisms which have been passed upon it at different times have often been undeserved, and those who have not read the book with care have frequently given a mistaken impression of it. The scheme is indeed well worthy to be looked upon as the original of the Garden City idea which Mr. Howard brought to practical experiment. Mr. Howard says that he had not seen Buckingham's book until "I had got far on with my project;" but in giving credit to the earlier writer we shall not lessen the actual value and the extraordinary success of Mr. Howard's own work.

BENJAMIN WARD RICHARDSON'S "HYGEIA"

In October 1875 Dr. Benjamin Ward Richardson, physician and sanitary reformer, read a paper before the Health Department of the Social Science Congress at Brighton, in which he described in some detail a City of Health to which he gave the name "Hygeia."¹ Although he did not put forward a scheme to build such a city, he maintained the practicability of each detail of it, and urged its adoption, and for this reason the proposal is of interest to us here. It may best be stated in his own words: "It is my object to put forward a theoretical outline of a community so circumstanced and so maintained by the exercise of its own free will, guarded by scientific knowledge, that in it the perfection of sanitary results will be approached, if not actually realised, in the co-existence of the lowest

¹ Hygeia : A City of Health. Macmillan & Co., 1876.

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possible general mortality with the highest possible individual longevity. . . .

"Mr. Chadwick has many times told us that he could build a city that would give any stated mortality, from fifty, or any number more, to five, or perhaps some number less, in the thousand annually. I believe Mr. Chadwick to be correct to the letter in this statement, and for that reason I have projected a city that shall show the lowest mortality. I need not say that no such city exists, and you must pardon me for drawing upon your imaginations as I describe it. Depicting nothing whatever but what is at this present moment easily possible, I shall strive to bring into ready and agreeable view a community not abundantly favoured by natural resources, which, under the direction of the scientific knowledge acquired in the past two generations, has attained a vitality not perfectly natural, but approaching to that standard. . . .

"Our city, which may be named Hygeia, has the advantage of being a new foundation, but it is so built that existing cities might be largely modelled upon it. . . . The population of the city may be placed at 100,000, living in 20,000 houses, built on 4000 acres of land, an average of 25 persons to the acre. . . . The safety of the population of the city is provided for against density by the character of the houses, which ensures an equal distribution of the population. . . .

"The acreage of our model city allows room for three wide main streets or boulevards, which run from east to west. Beneath each of these is a railway along which the heavy traffic of the city is carried on. The streets from north to south which cross the main thoroughfares at right angles, and the minor streets which run parallel, are all wide. . . . They are planted on each side of the pathways with trees, and in many places with shrubs and evergreens. All the interspaces between the backs of houses are gardens. . . . The accumulation of mud and dirt in the streets is washed every day through side openings into the subways, and is conveyed, with the sewage, to a destination apart from the city. . . ."

The houses were to be built of brick on arches through which the air flows freely. Glazed bricks, instead of plaster, to be employed

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for the inside walls ; kitchens to be at tops of houses and all smoke consumed ; the houses to be heated by hot air as well as fireplaces. There were to be no public-houses nor tobacco shops. Public laundries, swimming baths, a hospital, and a library were to be established. And instead of the gutter " the poorest child has a garden." " As my voice," the lecturer said in conclusion, " ceases to dwell on this theme of a yet unborn city of health, do not, I pray you, wake as from a mere dream. The details of the city exist. They have been worked out by those pioneers of sanitary science, so many of whom surround me to-day."

MODEL INDUSTRIAL VILLAGES

Originating with Robert Owen in New Lanark in 1800, a number of notable endeavours have been made from time to time, by the owners of large factories who recognised the value of healthy conditions for their employees, to build small industrial villages for their own workpeople. The first attempt to remove an industrial undertaking from a crowded town to a country district was that of Sir Titus Salt of Bradford, who made a fortune from the manufacture of alpaca. In 1850, after he had been in business many years, he decided to extend his works and remove them from Bradford. He did not like, he said, to be a party to increasing that already overcrowded borough. Land was purchased on the banks of the Aire, above Shipley, which, " for the beauty of situation and the salubrity of its air, was a most desirable place for the erection of dwellings," and building commenced in 1851. There, an enthusiastic biographer records, he " began to erect such a palace of industry as England had never seen, with dwellings for the workpeople contiguous." Eight hundred houses were erected for a population of about 3000, with a church, library, almshouses, and other buildings. There were no public-houses. The village was formally opened in 1853 and named Saltaire. Although this early attempt to provide the best physical conditions for homes and workshops is, after sixty years, a long way from satisfying the requirements of to-day, it was in its time a notable experiment, deserving of the

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credit due to a pioneer effort. So far as it went it was thoroughly successful. The houses were well constructed and the rents within the means of the workpeople, and, compared with the general conditions prevailing at the time, the conditions in the village were ideal.

Of other movements on lines similar to those adopted at Saltaire there has been a large number, the chief of which are Port Sunlight and Bournville, both well known. Port Sunlight was established by Sir William H. Lever in 1887, when he purchased 56 acres outside Birkenhead, at a cost of £200 per acre, for new works and a model village for his workpeople. The village is the property of his firm and exists for its employees only. It is well arranged, and its houses are excellently designed. The rents are from 3s. 6d. to 7s. 6d. per week, with rates in addition; these amounts cover the cost of maintenance and sinking fund only, and no interest on the capital expended is charged: the employer considering the village to be a form of "prosperity sharing" with the workpeople. It has been extended as the business increased, and is the most complete example in this country of the interest of a large industrial undertaking in the well-being of its own workpeople.

The village of Bournville was founded by Mr. George Cadbury in 1889, when he removed his cocoa works from Birmingham to the country. His scheme was not to build good cottages for his own employees only, but for "the working-classes and labouring population in and around Birmingham." "It has been my great privilege," says Mr. Cadbury, "to carry through a hobby which I have had in my mind since boyhood, the idea of getting men on to the land where they would enjoy their gardens."

Mr. Cadbury laid out the village and erected a considerable number of houses. At first, houses were sold on 999 years' leases, but as this encouraged speculation, the sale of property was discontinued. The entire estate has now been handed over by Mr. Cadbury to the Bournville Village Trust. The area of the land is 612 acres, of which 138 have been built upon. Nine hundred and twenty-five houses have been erected at rents from 4s. to 10s. per week, with rates in addition. These rents show a return to the trust of 4 per cent. on the capital invested. There are schools,

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a public hall, and a temperance inn. The village is an attractive example of good building and planning, and Mr. Cadbury declares that it has paid him in his business.

VI

The practical examples of model villages, together with the efforts of sanitary and social reformers to secure the better building of our towns, prepared the way for the proposal which was to be made in 1898 by Mr. Ebenezer Howard for the establishment of a new city on the basis of the experience of the past. At the close of the century, at a time when men were concerned as never before with the problems of the town, he formulated the proposal of which the suggestions and plans of Owen, Buckingham, and the Village Association were prophecies. And by his unwearied energy and the propitiousness of the times that proposal was brought to success. What that proposal was, and how it was put to the test, will be discussed in the next chapter.

CHAPTER II

ON THE ORIGINS OF GARDEN CITY (II.)

"BROADBENT : Have you ever heard of Garden City ?

TIM (doubtfully) : D'ye mane Heavn ? "

BERNARD SHAW, *John Bull's Other Island*.

I

MR. EBENEZER HOWARD'S¹ proposal to build a Garden City was made in a little book entitled *To-morrow : A Peaceful Path to Real Reform*, published in London in 1898, and re-issued in a third edition in 1902 under the title of *Garden Cities of To-morrow*. In this book Mr. Howard advocated the establishment of a model town of about 32,000 inhabitants in an agricultural district in England, in the building of which the best modern methods in engineering and sanitary science should be adopted, where healthy homes could be provided for all classes of people. "My proposal is," said Mr. Howard, "that there should be an earnest attempt made to organise a migratory movement of population from our overcrowded centres to sparsely-settled rural districts."² An area of 6000 acres, "which is at present purely agricultural," was to be "obtained by purchase in the open market at a cost of £40 per acre, or £240,000."³ The estate was to be held in trust "first as a security for the debenture holders and, secondly, . . . for the people of Garden City . . . which it is intended to build thereon."⁴

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"The objects of this land purchase may be stated in various ways, but it is sufficient here to say that some of the chief objects are these : To find for our industrial population work at wages of higher purchasing power, and to secure healthier surroundings and more regular employment. To enterprising manufacturers, co-operative societies, architects, engineers, builders, and mechanicians

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¹ Mr. Howard was born in London in 1850. He is a shorthand-writer by profession.

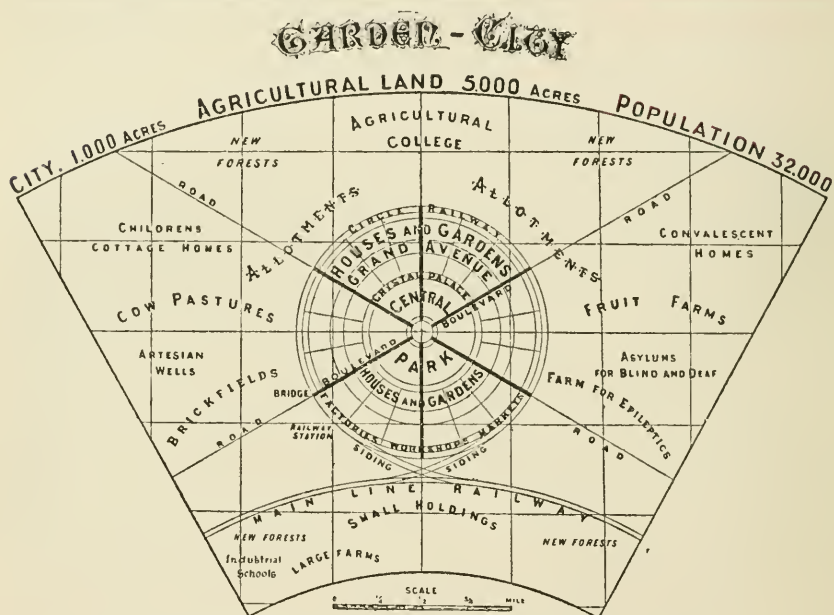
² *Garden Cities of To-morrow*, p. 112.

³ *Ibid.* p. 20.

⁴ *Ibid.* p. 21.

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of all kinds, as well as to many engaged in various professions, it is intended to offer a means of securing new and better employment for their capital and talents, while to the agriculturists at present on the estate, as well as to those who may migrate thither, it is designed to open a new market for their produce close to their doors. Its object is, in short, to raise the standard of health and comfort of all true workers of whatever grade—the means by which



Ebenezer Howard's Plan of Garden City (*To-morrow*, 1898).

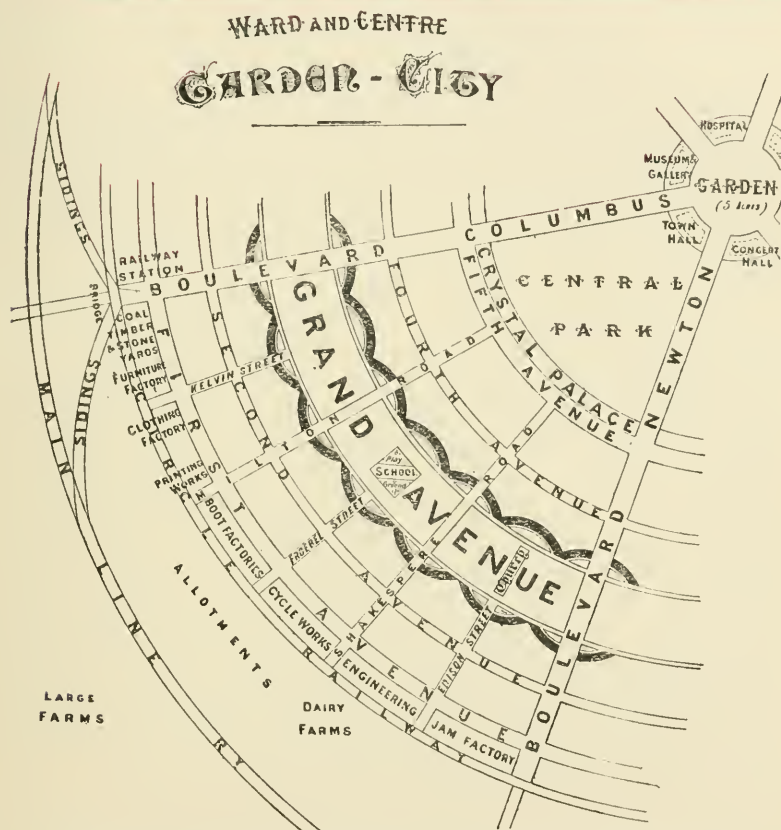
these objects are to be achieved being a healthy, natural, and economic combination of town and country life, and this on land owned by the municipality.”¹

The town built near the centre of the 6000 acres was to cover a sixth part of the area, and by two diagrams the author suggested that it might be of circular form, 1240 yards from centre to circumference. These diagrams sufficiently explain themselves; comment upon them is unnecessary as they have never been considered to form

¹ *Garden Cities of To-morrow*, p. 21.

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an essential part of the Garden City proposal. Mr. Howard went into certain details of expenditure, revenue, and administration, the most interesting of which is his scheme of rate-rents: "Amongst the essential differences between Garden City and other



Ebenezer Howard's Plan of a Section of Garden City (*To-morrow*, 1898).

municipalities, one of the chief is its method of raising its revenue. Its entire revenue is derived from rents ; and one of the purposes of this work is to show that the rents which may very reasonably be expected from the various tenants on the estate will be amply sufficient, if paid into the coffers of Garden City, (a) to pay the

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interest on the money with which the estate is purchased, (b) to provide a sinking-fund for the purpose of paying off the principal, (c) to construct and maintain all such works as are usually constructed and maintained by municipal and other local authorities out of rates compulsorily levied, and (d) (after redemption of debentures) to provide a large surplus for other purposes, such as old-age pensions or insurance against accident and sickness."¹

"The leases under which all building sites are let do not, therefore, contain the usual covenant by the tenant to pay all rates, taxes, and assessments levied in respect of such property, but, on the contrary, contain a covenant by the landlord to apply the whole sum received, first, in payment of debenture interest; secondly, towards the redemption of the debentures; and thirdly, as to the whole of the balance, into a public fund, to be applied to public purposes, among these being the rates levied by public authorities, other than the municipal authority, of the city."²

The administration of the city was to be in the hands of a board of management, elected by the "rate-renters."

The valuable part of the book was the way in which he set out his proposal as a "master-key" to the solution of many of the problems of the day. This is what he attempted to show: How, in the midst of the fresh air and beauty of the country, to create opportunities of profitable industry, prospects of advancement, and pleasant forms of social life, more attractive than any to be found in our present towns and cities. How to stem the tide of migration from country to town, and even to turn it back. How to combine with the advantages of country all the advantages of town. How, in fact, "to marry town to country, that from the union may spring a new hope, a new life, a new civilisation."

Without going into the causes which led to the aggregation of the people in large cities, Mr. Howard summed them all up as "attractions." Cities, in other words, are magnets which draw the people towards them; while the country is also a magnet, but one of less power over the average member of the community. The remedy he proposed was a "town and country magnet," a new combination of town and country life.

¹ *Garden Cities of To-morrow*, p. 28.

² *Ibid.* p. 40.

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Mr. Howard endeavoured to prove the feasibility of his project on economic, commercial, and financial grounds, and to indicate the advantages the inhabitants of the proposed town would be likely to enjoy. He also suggested that a great impulse to the whole nation's

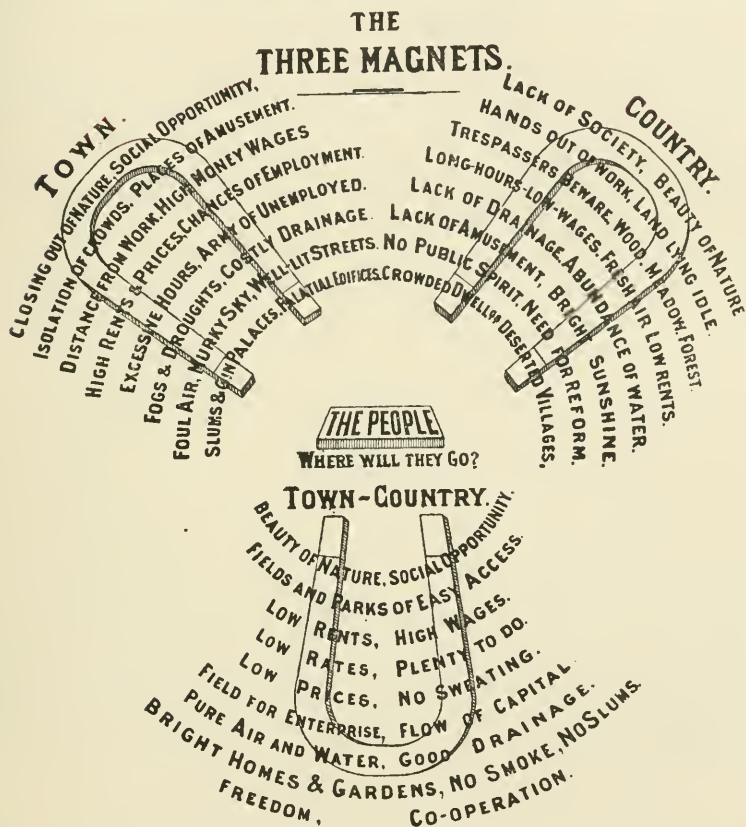


Diagram of the "Three Magnets" (*To-morrow*, 1898).

social development would come from the knowledge and experience acquired in the making of such an experiment as the building of an entirely new town.

Mr. Howard, like Buckingham, proposed that his scheme should be carried out, not by the state as a piece of socialism, but by private

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persons, combining philanthropy with business. He declared it to be part of his proposal "that the mind of the public should not be confused, or the efforts of organisers wasted in a premature attempt to accomplish this work on a national scale, but that great thought and attention shall be first concentrated on a single movement, yet one sufficiently large to be at once attractive and resourceful."¹

The other points of agreement between Garden City and Buckingham's Victoria may be summarised as follows :

1. An entirely new town was to be built.
2. Dividends paid to the promoters were to be limited.
3. Size of town to be limited.
4. Town to be surrounded by agricultural belt.
5. Factories to be so placed that the workers should have full enjoyment of the open air.
6. Expenses of the town to be met by rents.
7. Provision to be made to prevent overcrowding.
8. Town to be built on a regular plan, with houses for all classes of the community.
9. Other towns to be built beyond the agricultural belt on similar principles.

The main point of divergence was that Mr. Howard allowed for the industries and trade of the town to be undertaken by private enterprise, "the inhabitants of Garden City enjoying the fullest rights of free association, and exhibiting the most varied forms of individual and co-operative work and endeavour,"² while Buckingham supposed that manufacture and agriculture would be controlled by the town authority.

II

Mr. Howard's book was widely reviewed and promoted a great deal of discussion. As might be expected, many people took the proposal as a mild joke ; the diagrams of a circular town divided into areas by broad avenues rather like the spokes of a wheel

¹ *Garden Cities of To-morrow*, p. 112.

² *Ibid.* p. 112.

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aroused particular interest and even amusement. *The Times* (October 19, 1898) called it an "ingenious and rather entertaining attempt," and added "the only difficulty is to create it."

But many readers saw the possibilities suggested by the book of an important practical step in the reform of town life. The evils of the congested town and the declining population of country districts had been pointed out many times before; but there had never been so picturesque, so practical, and so timely a suggestion for dealing with them as Mr. Howard was fortunate enough to make. His very title of "Garden City" was particularly happy, conveying at once an idea totally different from that suggested by the bewildering and ghastly names some other model towns had borne.

All these factors helped to make the idea popular, and in less than eight months after the publication of the book the Garden City Association was formed with Mr. F. W. Steere, a barrister, as its first honorary secretary. Mr. Clement M. Bailhache (now Mr. Justice Bailhache) was also honorary secretary for some time, and did much valuable work. The object of the association was to carry on the discussion of Mr. Howard's project by means of lectures, and "ultimately to formulate a practical scheme on the lines of the project with such modifications as may appear desirable." The association appealed to all persons "desirous of improving, by constitutional means, the present physical, social, and industrial conditions of life in town and country," and three months after its formation Mr. Howard was able to declare: "The association numbers amongst its members manufacturers, co-operators, architects, artists, medical men, financial experts, lawyers, merchants, ministers of religion, members of the L.C.C. (Moderate and Progressive), Socialists and Individualists, Radicals and Conservatives."

The subscription to the association was one shilling, and in the first two years the total amount subscribed to its funds did not exceed £241 13s. 9d. The members had, however, remarkable enthusiasm; they firmly believed that the Garden City was to become a reality. Committees were appointed to consider many of the questions with which the new town would have to deal—land tenure, housing, labour, engineering, architecture, education, liquor-

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traffic, and manufactures. The sites committee went into the question of a site, and there was immense activity all round. So soon as May 1900 the association resolved: "To form a limited company called the Garden City, Limited, with a share capital of £50,000, of which £5000 was to be a first issue, with a cumulative five per cent. dividend, redeemable at the option of a body of trustees representing inhabitants, provided that when so redeemed holders of shares receive a premium of ten per cent. in addition to any cumulative interest." Representatives were to be appointed to secure gifts to the amount of £250 for preliminary expenses. The resolution was found to be premature, however, for the matter had not yet been sufficiently discussed, and the proposal to start at once with the formation of the Garden City, though it did not actually drop, had to be held in abeyance.

In 1901 Mr. Ralph Neville, K.C. (now the Hon. Mr. Justice Neville), became chairman of its council and Mr. Thomas Adams (now town-planning assistant at the Local Government Board) was appointed its first paid secretary. The association at once became of a more practical character; its activity increased tenfold, but so did its stability. An attempt was made to bring the proposal before a wide public by organising a conference at Mr. Cadbury's village at Bournville. The object of the conference was: "To consider the experiment of Mr. Cadbury in removing his works from Birmingham to Bournville; the difficulties and advantages which attend the removal of works from large cities to new districts; how local authorities and other organisations can co-operate with such movements; and the desirability and practicability of a movement of manufacturers and co-operators to new areas, so that new towns may be established on land to be purchased for the community."

The conference was a marked success. Over 300 delegates from borough and urban district councils, religious denominations, trades unions, co-operative and friendly societies attended, and the proceedings received extensive notice throughout the newspaper press of the country. In July 1902 a second conference was held at Mr. W. H. Lever's village of Port Sunlight near Liverpool, which was attended by nearly 1000 delegates of public bodies and societies, and attracted even more attention than the first.

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These two conferences were decisive steps in the propaganda which led to the creation of Letchworth, for they showed to a large public concrete examples of the application of those methods of industrial development which were involved in the Garden City idea. The immense value of these villages as actual object lessons on a small scale of the practicability and commercial advantages of the proposals brought forward by Mr. Howard was incalculable. The Garden City proposals went very much further than anything that had been done at either of them; but all the same they did suggest something of the Garden City in practice, and their existence and the wealth and commercial standing of their promoters did much to convince the public that what the Garden City Association was preaching was no idle dream.

III

Here we may observe the three factors which gave credibility to the Garden City proposals. The first was that the building of the town was brought forward as a legitimate and proper undertaking for private enterprise. Had Mr. Howard and the Garden City Association held to the belief that the state should carry out the scheme, it is certain that the proposals could never have been realised, and their propaganda would have gone for nothing. Their belief in themselves was stronger than their belief in the state. "Fortunately," said the Lord Mayor of Birmingham at the Bournville Conference in 1901, "no fresh legislation is necessary, or you need wait for none, before you proceed in this direction. If you had to do so I should almost despair of the movement going forward." The second factor was the simplicity of its economic basis, a matter on which some further remarks will be made later on. The third was the existence of the examples of Bournville and Port Sunlight which enabled the association to say, "It is a practical scheme, which in some of its most important bearings has been successfully tried."

There were, of course, other factors which had considerable influence. There was the desire of all decent men and women

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that poor people should live in healthy homes and not in slums ; there was the knowledge that the conditions of life in our great towns were producing serious physical deterioration, which the conditions provided in Garden City would combat ; there was the picturesque appeal of happy cottages set in gardens of flowers ; there was the longing of the land reformer for a new experiment in the ownership of land ; and there was the delight which men had, and will ever have, in the idea of an ideal city.

The economic basis of the Garden City proposal, after all, was and still is the matter of greatest importance in connection with the scheme, and it was due to the soundness of this basis, and, perhaps, more to the ease with which its soundness could be perceived, that the proposal was so quickly recognised as a practicable one. It is in this respect that Mr. Howard's scheme had an advantage over Buckingham's. The earlier proposal was made before the enormous increase in land values, due to the growth of the towns, was apparent ; and Buckingham could not show, as Mr. Howard could, what excellent economic security was provided. Owing to the efforts of land reformers of all sorts, the idea of the "unearned increment" on land was perfectly familiar to the majority of people at the time Mr. Howard wrote, and although politicians of different parties might disagree as to whom the increment properly belonged, there was no doubt that it existed. The "unearned increment" was the financial basis of the Garden City scheme, and the chairman of the association, at that time Mr. Ralph Neville, K.C., immediately seized upon the importance of the factor and pushed it home. To no one, in the early days of the movement, did Garden City owe more than it did to the sagacity and influence of its chairman, and it is not too much to say that the success with which the scheme met was due more to him than to any other person. At the Bournville Conference in 1901, soon after he became chairman, Mr. Neville said : " The automatic rise in the value of the land which will take place as soon as you attract people to your city . . . is the real basis of the thing. It really is a transaction which takes place every day over and over again in private speculation, the only difference being that in the one case the private speculator puts the unearned increment into

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his own pocket, whereas in the case which we are supposing that increment goes to the advantage of the citizens themselves."

It was this clear and decided exposition of the Garden City economics which kept the proposal from being overwhelmed by the extra-proposals of many excellent people with sociological, technical, artistic, and political fads of their own which they wished to see imposed upon the main idea. The escape which Garden City succeeded in making from these people was nothing less than miraculous, and it is a testimony to the soundness of the essential part of the proposition that it maintained its integrity until it could be realised at Letchworth.

IV

At the end of December 1901 the council of the association decided to resume their earlier plan of putting the idea to practical experiment, by taking steps to form at once a preliminary company with the object of raising sufficient funds to investigate estates and to secure a site or the option of one. In June of the following year a meeting was held at the Crown Room, Holborn Restaurant, with Earl Grey in the chair, when the speakers were Mr. Ralph Neville, Mr. W. H. Lever, Sir William Richmond, the Bishops of Rochester and Hereford, Mr. Aneurin Williams, and others, and approval was given to the creation of a pioneer company for the purpose of securing a site and of preparing a scheme for its development as a Garden City.

On July 16, 1902, the Garden City Pioneer Company, Limited, was registered, with a capital of £20,000. The principal object of the company as set out in the memorandum of association was : " To promote and further the distribution of the industrial population upon the land upon the lines suggested in Mr. Ebenezer Howard's book, entitled *Garden Cities of To-morrow* (published by Swan, Sonnenschein & Co., Ltd., in 1902), and to examine, test, and obtain information, advice, and assistance with regard to the matters therein contained, with the view of forming in any part of the United Kingdom ' Garden Cities ' (that is to say) : towns or settlements for agricultural, industrial, commercial, and residential

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purposes, or any of them, in accordance with Mr. Howard's scheme, or any modification thereof."

The directors were : Ralph Neville, K.C. (chairman) ; Edward Cadbury, manufacturer ; Ebenezer Howard, author of *Garden Cities of To-morrow* ; T. H. W. Idris, J.P., mineral water manufacturer ; Howard D. Pearsall, M.Inst.C.E. ; Franklin Thomasson, J.P., cotton spinner ; Thomas Purvis Ritzema, J.P., newspaper proprietor ; Aneurin Williams, ironmaster. The list of the first subscribers of shares included the names of George Cadbury (1000), Alfred Harmsworth (1000), W. H. Lever (1000), and the late J. P. Thomasson (1000).

The issue of the prospectus aroused considerable interest, and as an instance of the public service the newspaper press can render it is worthy of note that many of the leading London and provincial papers printed it in their advertising columns free of charge. The prospectus gave an outline of the Garden City scheme, and concluded by stating with wonderful frankness : " It is not suggested that the project in its present stage offers the ordinary inducements to investors, the proposal being that the shareholders of this company shall not receive any profits by way of dividend, but that if, and when, the ultimate company is formed they shall be entitled to fully paid shares in such company of a nominal amount equal to the aggregate of (1) the amounts paid up upon their shares in this company ; (2) a sum equal to interest thereon at 4 per cent., calculated from the date of payment to the date of allotment of the fully paid up shares. It should be pointed out that if ultimately the public fail to subscribe the capital necessary to form the ultimate company, the capital of this company might be in part or wholly lost." The whole of the £20,000 was subscribed before December in that year, about four months after the issue of the prospectus.

The company immediately set to work to find an estate. The investigations had to be undertaken privately, for obvious reasons, and negotiations were somewhat hampered because the enterprise was regarded as extremely visionary by many land owners and agents. Six estates were, however, carefully gone into out of a number which were brought forward, and four out of this number in Warwickshire, Staffordshire, Nottingham, and Essex were con-

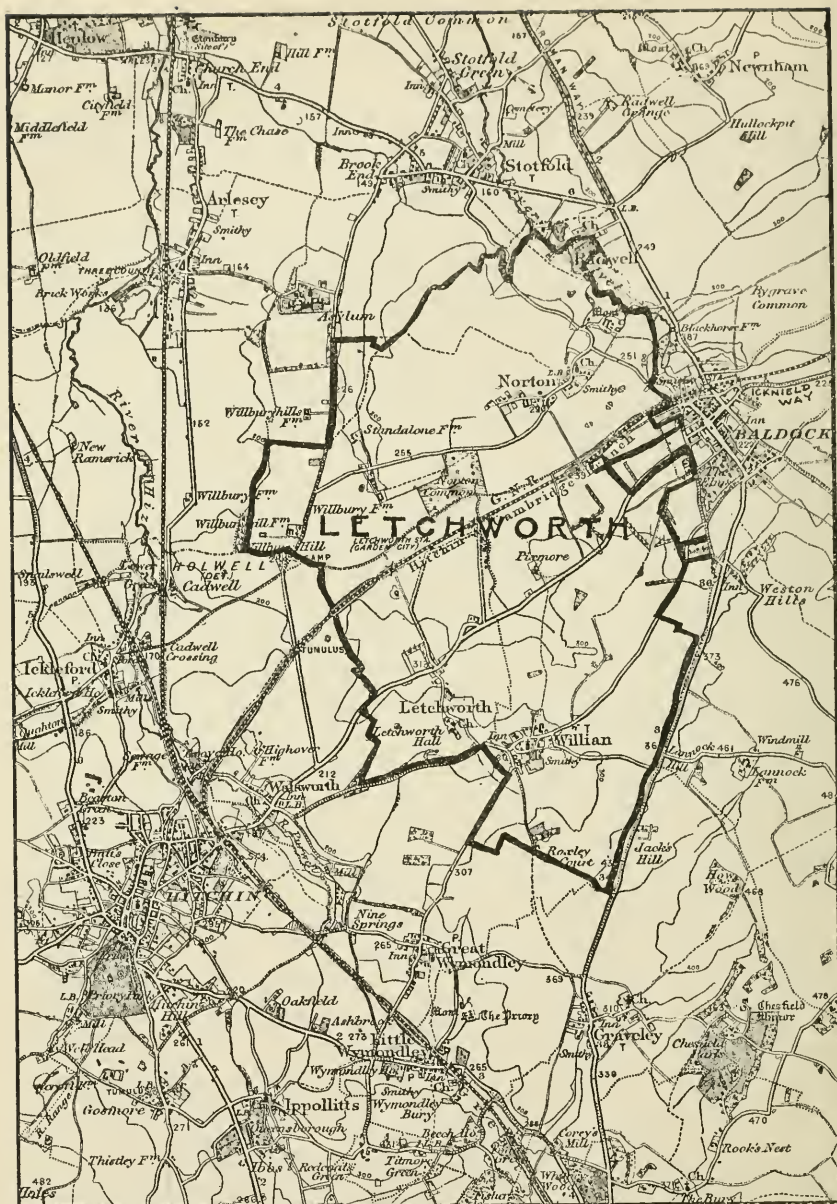
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sidered fairly suitable for the company's purpose. The main conditions required to be fulfilled by the site for the First Garden City were :

1. That the estate should consist of from 4000 to 6000 acres of freehold land in a ring fence.
2. That it should have on or adjacent to it a main line of railway.
3. That there should if possible be means of water carriage.
4. That the estate should be capable of an economical drainage scheme.
5. That a completely satisfactory water supply should be available.
6. That it should be near to London or some other large centre of labour.

At one time the directors had almost decided upon an estate in Staffordshire, known as the Chartley estate. This estate had many advantages ; it was held in one hand and consisted of about 6000 acres, it was very healthy, its central part was eminently suitable for the town, there were three railway stations on it, and the owner was really anxious to sell. Its serious disadvantages were its distance from London and the existence of small parcels of land within the main estate belonging to other owners.

In April 1903 the company was fortunate enough to hear through Mr. Herbert Warren of an estate, known as the Letchworth estate, near Hitchin in Hertfordshire. The area of the estate was 1014 acres, very much too small by itself, but when it was found that sufficient adjoining properties could be bought to make up an area of nearly 4000 acres, it was realised at once that here was very nearly the ideal site. Mr. F. E. Fremantle, the medical officer of health for the county of Hertford, who had rendered help to the company before, was able to advise as to its undoubted healthiness, and the late Mr. G. R. Strachan, who had also given much valuable assistance, reported no less favourably on the certainty of a satisfactory water supply, and that the conditions of the soil and the contour of the land would allow for a drainage scheme at a minimum cost. A week less than a year since the foundation of the company the contracts were signed for the purchase of the greater part of the estate, and in a few weeks the contracts for the



The Garden City Estate and the Surrounding Country. The area marked on this map includes that of the additional land, to the south of Willian Road, purchased in 1912.

Reproduced with slight alterations from the Ordnance Survey Map, with the sanction of the Controller of H.M. Stationery Office.

On the Origins of Garden City

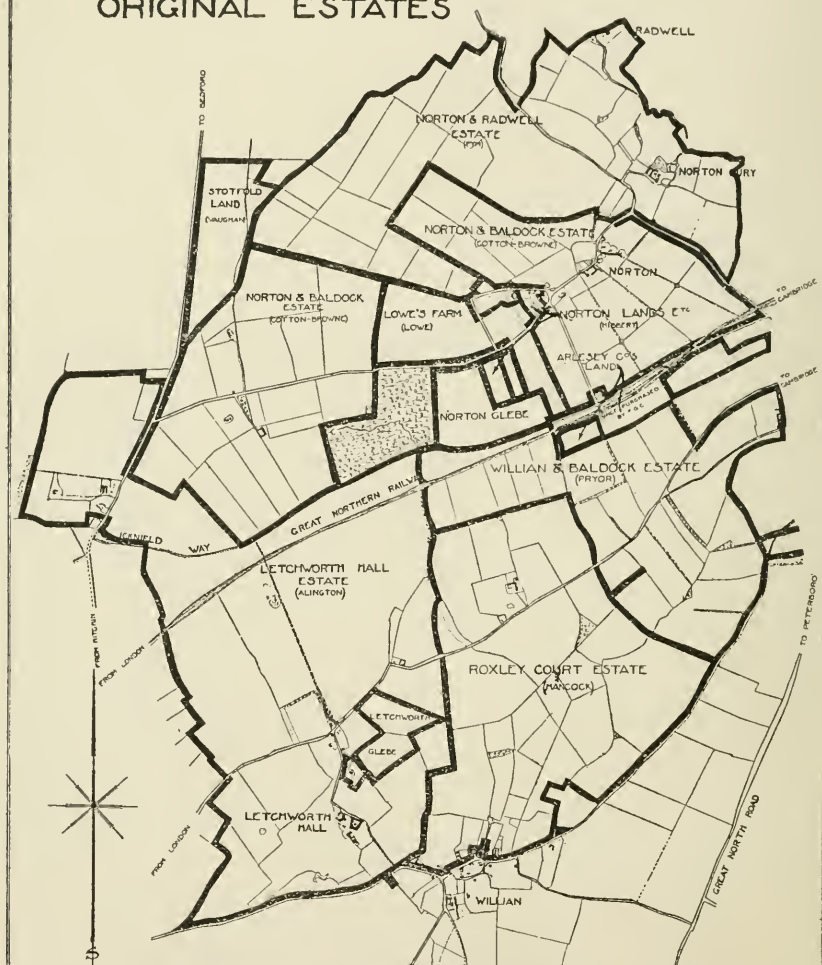
whole area were completed. The land was bought from fifteen different owners at a total cost of £155,587. The area was 3818 acres, so that the average cost of the land per acre was £40 15s. Certain small parcels of land cost as much as £101; but that was for land adjacent to Baldock. The old Letchworth estate itself was purchased for just over £40 per acre. The contracts and options were in some cases made direct with the company, in other cases the names of nominees were inserted, to avoid prices being raised by any particular vendor on the ground that his portion of the land was essential to the scheme. The secrets of the purchase were well kept by all concerned, though in the case of one of the largest portions of the estate the vendor for some reason unexpectedly broke off negotiations and was with difficulty induced to resume them. As it was necessary to give notice to the tenants before Michaelmas, the purchases were pushed on rapidly, counsel being kept specially in town during the vacation to examine the titles. The period of the negotiations for the various purchases was an anxious and exciting one, as the failure to secure any part of the land would have rendered the acquisition of the rest useless. The directors of the Pioneer Company are to be congratulated on the success with which they carried through the business, and for the courage with which they entered into the options and, in some cases, absolute contracts to purchase, as failure in settling with any one vendor, or to obtain the requisite capital to complete the purchases, would have jeopardised the whole undertaking.

Immediately the contracts were signed, the shareholders of the Pioneer Company were informed that an estate had been acquired, and an effort was made to raise £50,000 to complete the purchase, it being intended to leave the greater part of the cost temporarily on mortgage, and of this sum over £40,000 was subscribed by the directors and their friends.

V

First Garden City, Ltd., was registered at Somerset House on September 1, 1903, with an authorised capital of £300,000, and seven days after its incorporation the first prospectus was issued, inviting subscriptions for £80,000 share capital. The directors of

FIRST GARDEN CITY PLAN SHEWING ORIGINAL ESTATES



A Plan showing the Areas of the original Estates at the time of purchase by the Garden City Company in 1903.

On the Origins of Garden City

the new company were the directors of the Pioneer Company, with the addition of Mr. H. B. Harris, solicitor, and Mr. W. H. Lever, of Port Sunlight. The prospectus stated the objects of the new company as follows: "The company has been formed to develop an estate of about 3800 acres, between Hitchin and Baldock, on the lines suggested by Mr. Ebenezer Howard in his book entitled *Garden Cities of To-morrow*, with any necessary modifications. It is believed the result will be not only to promote a great social improvement, but to provide for those who can afford to wait an investment which will prove a sound one.

"The *root* idea of Mr. Howard's book is to deal at once with the two vital questions of *overcrowding* in our towns and the *depopulation* of our rural districts, and to thereby reduce the congestion of population in the great towns, or at least arrest its progress.

"The difficulties of dealing with the housing question in our overcrowded industrial centres become increasingly apparent with every fresh attempt at amendment. The expense is enormous, while improvement in one direction frequently increases the evil in another. The only satisfactory way out of the difficulty is to start afresh and establish a new town to which those manufacturers whose businesses admit of such removal may go. For this purpose the company have acquired a site within thirty-five miles of London, admirably adapted for the purpose of industrial and residential development. The estate is traversed not only by important highways, but for a distance of two and a half miles by the Great Northern Railway from London to Cambridge, and it is within one and a half miles of the Great Northern main line from London to the north and of the Midland line from Bedford to Hitchin. The Great Northern Railway Company is prepared to give the company facilities for starting the scheme, and has consented to erect a temporary station at once. There are fifty-two trains per day to and from London and Hitchin, a number of which take only forty-two minutes in the journey.

"The company, however, do not propose to develop the estate upon the ordinary lines. The exceptional features of this scheme are that the town is to be limited to a population of about 30,000 inhabitants, that the greater proportion of the estate is to be retained

The Garden City

for agricultural purposes, and that the dividends to shareholders are to be limited to a cumulative dividend of 5 per cent. per annum. In the event of a winding-up, the shareholders would be entitled to no more than a return of their capital with a bonus not exceeding 10 per cent. plus any arrears of dividend. The advantages anticipated from this new departure in the development of a building estate are : Firstly, the provision of hygienic conditions of life for a considerable working population. Secondly, the stimulation of agriculture by bringing a market to the farmer's door. Thirdly, the relief of the tedium of agricultural life by accessibility to a large town. Fourthly, that the inhabitants will have the satisfaction of knowing that the increment of value of the land created by themselves will be devoted to their own benefit.

"The control of the site of a town from its commencement obviously offers an unparalleled opportunity for the provision of open spaces and allotments while land is cheap, and also for the supply of power, light, and water on advantageous terms. These supplies the company propose either to undertake themselves or to procure on the lowest possible terms. An adequate supply of good water can be obtained at a moderate cost. . . .

"The money raised by this issue will be used in part payment for the land, so that conveyances may be taken ; the remainder of the purchase-money remaining on mortgage for the time being. The directors will meanwhile continue their negotiations with manufacturers and other prospective tenants, and when they have entered into suitable agreements so as to secure an initial population, and have completed their plans for laying out the estate, they will issue sufficient of the remainder of the share capital to the public in order to pay off the balance of the purchase-money and provide funds for development. Such issue will, they hope, be made within six months. . . .

"In the face of physical degeneration, the existence of which in our great towns is incontrovertible, imperialism abroad and progress at home seem alike an empty mockery. Sound physical condition is surely the foundation of all human development, and the directors submit to the public a scheme for securing it in a particular instance which they believe to contain all the elements

On the Origins of Garden City

of success, and which, if carried to a successful issue, will lead to that re-distribution of the people upon the land, in which, and in which alone, as they believe, is to be found a solution of the problem—How to maintain and increase industrial efficiency without impairing the national physique.

“ It is difficult to speak with certainty of the financial prospects of an undertaking which presents some features of novelty, but the directors (who themselves and their relations are finding about £40,000 of the capital) believe that if sufficient capital is subscribed the undertaking will soon become dividend-paying, and prove a sound investment at a cumulative rate of 5 per cent. per annum.

“ Much interest has been evinced in the movement by manufacturers, some of whom are already contemplating the acquisition of sites in Garden City. The site is peculiarly suitable for manufacturers, in view of its nearness to an existing supply of labour, the presence of cheap building material in the district, the good transport facilities, and its proximity to London. The directors have also reason to think that there will be a considerable demand for land on the estate for residential purposes. The site is an extremely healthy one, and several applications for plots for private residences have already been received. Similar land near the estate and on the outskirts of Hitchin has been sold at a rate exceeding £800 per acre. . . .

“ The consideration receivable by the Pioneer Company for the making over of their contracts, rights, and assets to this company has been fixed by the Pioneer Company (who are the promoters of the company), and is the allotment to the shareholders of the Pioneer Company of fully paid shares in the capital of this company, with interest thereon at 4 per cent. per annum from the respective dates of the payments on the shares of the Pioneer Company to the date of allotment of the shares in this company, fractions of £1 sterling to be paid in cash.”

On October 9, 1903, there was a private view of the estate, and Earl Grey presided over a formal opening, when a thousand shareholders and other guests, including many public men, were present. The gathering was a memorable one ; for three miles from any town, in the midst of a quiet country-side, this company of business

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men, politicians, social reformers, philanthropists, and the curious met to celebrate the beginning of a new movement in English life ; nineteenth-century housing methods and houses were at an end, and a new kind of development for our towns, and a new kind of house for people to live in, were inaugurated.

The Pioneer Company, having completed its task, was wound up at the end of 1903, seventeen months after its formation.

Our concern is now with the establishment and growth of the Garden City in which Mr. Howard and those associated with him were so happy as to see realised the fruits of their labours, and in which may be perceived one of those " innovations which are the births of time."

CHAPTER III

THE GROWTH OF GARDEN CITY

"The continual stir and motion of a comely human life."

WALTER PATER, *Marius the Epicurean*.

I

WHEN Mr. Ebenezer Howard described the Garden City in his book he pictured it as already complete. He gave no hint as to the manner of its growth. "The reader is asked to imagine" the town as Mr. Howard saw it. "In my book," he said at a later date, "I passed in thought rapidly over all intervening stages, and sought to picture what would happen in England if such a city were built, rather than to trace the successive steps which would have to be taken to build it." This method had much to commend it, as well as obvious defects: it enabled the proposal to be put forward in such a way as to attract public attention without provoking discussion on matters of detail; and it enabled its advocates to enlarge on the picture drawn by Mr. Howard, and to colour it according to their tastes, without losing the definiteness of its main outlines. This was all to the good; for had general attention been directed to the consideration of the practical working details of the scheme, the dissension which would have undoubtedly arisen out of the variety of opinion might have overwhelmed the proposal in its early stages; and even had it survived it might have remained the particular fad of a group of social theorists. As it was, the concentration of the public mind on the picturesqueness of the scheme and on the simplest and least debatable of its economic features secured for it the support of all sorts of people, of all political parties and schools of thought, extremists and moderate men, conservatives as well as socialists. And when

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the town came to be founded these different people met and assisted each other in the building of it without it becoming the special property of any of them.

The chief defect of this insistence on the pictorial aspect of the proposal was that its promoters forgot, or at any rate seemed to overlook, the fact that the town would necessarily be a growth : that it could not be established at a jump. If the question were asked, "How long will the Garden City take to build?" the answer was "A few years, we suppose," and sometimes seven years were given as a limit. The more prudent refused to commit themselves, as they would over any other question, but the general impression conveyed was that when the land was secured the town would rise up on it like a city in the *Arabian Nights*. No one knew, or pretended to know, how it was to be done. The matter was hardly considered. Another and a more serious defect in this method of presenting the proposal was that it over-emphasised the artificiality of the scheme. The idea of a complete and perfect city, despite irreproachable sanitation, freedom from slums, and splendid regularity, was not altogether attractive to many reflective minds. Its formality, order, and completeness, its fearful up-to-date-ness, its cold, clean, and new atmosphere, were, however desirable in theory, more than a little repellent in prospect. It is no wonder that men with rather more restrained imaginations than the eager reformers who pictured the delights of the Garden City accepted the promise of those delights with hesitation. Science and mechanical perfection could provide small compensations for the loss of that quality in a town which is rightly called its soul. And the old towns, with all their faults, certainly possessed that quality, but the projected town, this ideal Garden City, could men give a soul to it? For this reason many people, while not denying the economics of the scheme, had no faith that it could be realised. Men would not consent to live under the perfect conditions of the Garden City, said they. Who could be happy in an ideal city? Would Mr. Howard, himself, enjoy his Garden City, any more than Mr. Wells could be expected to be satisfied with his Utopia? The ideal cities are good in books, but none but madmen and dull persons would ever inhabit them.

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II

The Garden City of reality is, we shall find, a very different thing from Mr. Howard's ideal. The vagueness of method, which has just been called a defect, and was very properly considered a defect in the original proposal, was indeed the factor that saved the scheme in practice. The actual Garden City is less perfect than the ideal, but, we may hope, more human. It is less complete, but it is based on more secure foundations. It has, in a word, successfully escaped the formality which belonged to the town on paper. It was not made piece by piece, section by section, until the whole was finished ; rather, it grew slowly, in many unexpected ways, shaped by the idiosyncrasies of men. It has, indeed, the marks of artificiality that all towns have, but its natural and unforced growth has delivered it from the banality of the anticipatory pictures of it. Its artificiality is, in fact, immeasurably less oppressive than the evil artificiality of the industrial towns, where the houses of the poor are witnesses to the brutal minds of their builders, and if it has a touch of finer and more deliberate art than the new residential suburbs, it has not their unashamed pretentiousness.

More than to any other cause, the absence of disagreeable artificiality is due to the fact that the plans of the promoters were not drawn up in a fixed and unchangeable manner at the start. They were not drawn up for the simple reason that the directors of the company did not know what they were going to do. The Garden City was to be built and they were to build it, that is about the sum of what they definitely knew. They could not set out to force the town into a shape corresponding to a pre-arranged system when such a system did not exist. They had no solution for all the problems of town-building with which they were likely to be faced. They had, indeed, just enough money, just enough expert assistance, and just enough theory to deal with each problem as they came up to it. They looked ahead, it is true, but, on the whole, what they saw when they looked was the application of a few principles only. They saw that they must have a settled plan

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of the town, so far as the main lines of its development were concerned ; they saw that they must retain the freehold of the land ; they saw that they must prevent the possibility of slums and overcrowding ; and they saw that some qualities of the country must permanently be preserved. These four principles (together with the limitation of the return to the shareholders, which had been already fixed at 5 per cent.) were held as fundamental to the undertaking, and on them, with many other minor ideas, some impracticable and gradually discarded and others quite practicable and useful, they formed the policy which guided them in the development of the town.

It would be difficult to conceive of a policy more adaptable and more elastic than that which was so formed by the directors of the First Garden City. It certainly can never be criticised on the ground that it was too narrow. With much more justice it may be condemned because it was too broad. It was so far from rigidity that the company were led into many bad mistakes, which only the size of the undertaking prevented from being fatal. The policy was no more than the bare minimum on which the Garden City scheme could be carried out.

So far as æsthetics were concerned the directors had no policy whatever, except what the cleverness and persistence of their consulting architect forced upon them. Before development had actually begun they issued a pamphlet containing suggestions and instructions to prospective builders, in which they spoke of "the high standard of beauty which they desire to attain in the Garden City," but no means were taken to set up such a standard.

In entering upon criticism of this rather loose policy the novelty of the undertaking on which the company had embarked must be borne in mind. There were no models to guide them, and they could look for no precedent for what they wanted to do. They had to work their own way out of the innumerable difficulties which they encountered, and it is a testimony to their courage and determination that they faced those difficulties without hesitation.

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III

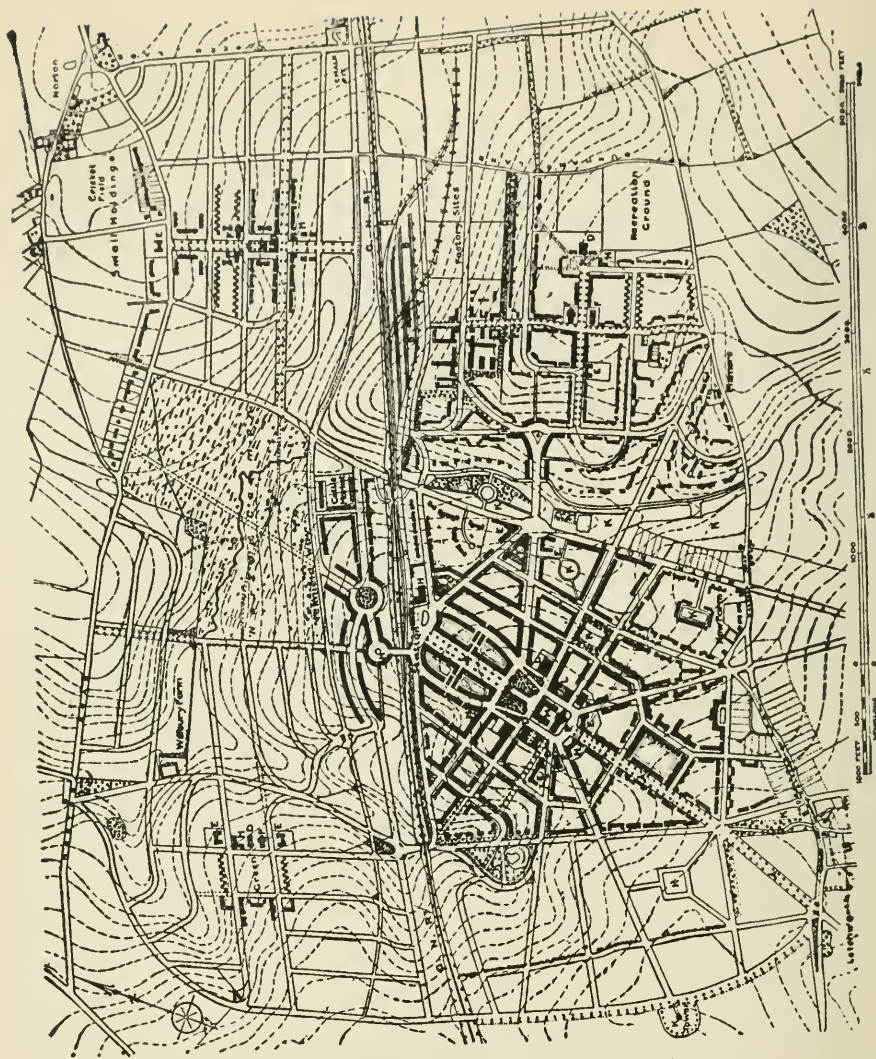
An examination of Messrs. Parker and Unwin's plan of the town illustrates our argument. The plan is worthy of study as the first of the recent attempts at "town-planning" in England, and it is still by far the largest and most complete town plan that has been made. It was designed for a town of thirty thousand inhabitants on an area of about 1250 acres: an average of about five houses or twenty-four persons per acre. Of the total area of the estate about 2500 acres were to be reserved as a rural belt surrounding the town. The site, it will be observed, was bisected by a railway and crossed by main roads, the chief of which ran from Hitchin, through Royston to Cambridge. The Great North Road skirted the estate on the south and east. The town of Hitchin (10,000 inhabitants) was one and a half miles from its boundary on the west, and the eastern boundary ran into Baldock (2000 inhabitants). In preparing the plan consideration had to be given to questions of main drainage and the provision of public services—water, gas, electricity, and so forth. That the town was to be organised for industrial purposes and that there was to be a residential area were other considerations to which effect had to be given. A report issued by the directors, dated April 20, 1904, says: "The preparation of this plan has practically occupied six months, the work having been considerably delayed by the unsatisfactory conditions of the weather during the past winter. You will see from it that the whole of the ground was carefully contoured before the town was laid out. This work occupied the company's engineer during the months of October, November, and part of December 1903. As soon as these contours were sufficiently completed to permit of a sketch plan of the town being prepared, two sets of architects were employed to design the city, and the result was that the main ideas suggested in the plan of Messrs. Barry Parker and Raymond Unwin¹ were adopted, but even as it is now placed before you it will be subject to modification as development proceeds."

¹ The other plan, which was not adopted, was the work of Mr. Halsey Ricardo and Professor W. R. Lethaby.

PARKER & UNWIN'S
ORIGINAL PLAN OF
GARDEN CITY,
AS FIRST PUBLISHED
(APRIL 1904)

Key to Plan

- A. Main Avenue
- B. Goods Yard and Sidings
- C. Central Square
- D. Sites for Public Hall, Museum, etc.
- E. Sites for Schools
- F. Sites for Places of Worship
- H. Sites for Hotels
- K. Open Spaces, Greens, or Parks
- L. Site for Post Office
- M. Site for Municipal Buildings



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It will not be disputed that the plan does considerable credit to its designers. Although, as the report just quoted states, "the preparation of the plan was not simply the work of the architects," they were, in fact, the men responsible for it, and to them the credit of whatever successful elements are possessed by it is due. It is possible that they had greater belief in the ability of the "town-planner" to control the life and growth of a town than either history or even the short career of Letchworth would by this time give them warrant, but the logic of their plan and the definiteness and simplicity of its main points are excellent features. That the plan is open to criticism hardly needs to be said, but its most severe critic will admit its good qualities. It is weakest on the industrial side, as the recent discovery of the necessity to develop an area to the west of the town for factory sites goes to prove ; in the original plan the factories were placed to the east, and this had always been thought to be one of its most successful features. In opening up this new area a vital blow is struck at the fundamental ideas on which the plan was based.

The main road of the town runs from the Hitchin Road to the Letchworth railway station, a length of about one mile. It will have a uniform width of 100 feet. Only a small length of it has, so far, been constructed, and Norton Way, made in 1905, has become the main highway. The latter road practically divides the town into two parts, separating the strictly industrial from the residential area, and is always likely to be a road of considerable importance. The Town Square was projected as a central meeting place for the town from which the roads would radiate to all parts. It is about 300 feet above sea-level, and although it is not the highest point of the estate, it is on a fine level piece of land of considerable extent, from which views of the distant country will always remain open. The square as originally planned consisted of four acres, which have now been reduced to three, a little larger than Belgrave Square, London ; its development is already in hand, and the arrangement of the buildings on it will be one of the greater architectural problems of the town.

The ideas of the architects who prepared the plan were among the most definite held by those who were associated with the

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promotion of the town. With the exception of the late Mr. G. R. Strachan, the engineer who designed and settled the water and drainage schemes, there was no one with a more comprehensive grasp of the problem than they had. It is probable that had they been given more control over the development of Garden City than actually fell to their lot the place would have greater consistency than it shows signs of to-day. That they did actually have a considerable influence upon the use of material and upon design in the early days, as well as being largely responsible for the lay-out of the plots, is certain, but it is not equally certain that their influence was altogether for good. The incompleteness with which it was exercised and the absence of authority to back it were no doubt largely responsible for the rather poor results produced. This is a matter which will be more fully discussed in the chapter on architecture ; it is sufficient to say here that their influence fell short, partly because, as every one who observed the early attempts to carry out their ideas will agree, it was based upon theory rather than practice. And in experts this is no small shortcoming. Theories, whether learnt from William Morris or invented for oneself, are good for one's own personal experiments ; they are bad to enforce upon others.

IV

After the completion of the plan the name of the town was decided upon. It may seem that Garden City should have been its natural and proper name ; but it was thought that as the whole object of building a Garden City in Hertfordshire was that there should be other Garden Cities in other parts of the country, the new town should not bear a name that was really generic. Very many names were proposed, and of these six were put before the shareholders of First Garden City, Ltd., to vote upon, and in August 1904 Letchworth (Garden City) was chosen by a large majority. The escape of the town from the last name on the voting card reproduced hereunder is a matter for congratulation. What its

The Growth of Garden City

fortunes would have been under the infliction of such a name is not difficult to anticipate. "Alseopolis, Hertfordshire," would have been too much for any but retired Americans.

"FIRST GARDEN CITY, LIMITED"¹

Name of First Garden City at Letchworth

VOTING CARD

Put a cross thus X opposite the name for which you wish to vote. No other mark should be made.

SUGGESTED NAMES.							
1.	GARDEN CITY	..	..	..	..	..	..
2.	LETCWORTH (one of the Parishes on the Estate). Saxon :— <i>Lecha weorthig</i> , 'the farm by the rivulet'						
					
3.	LETCWORTH (GARDEN CITY)	..	..	..	..	..
4.	WELLWORTH. A combination of three parishes on the Estate, viz., Willian, Wilbury, and Letchworth						
				
5.	HOMESWORTH	..	..	..	..	..	..
6.	ALSEOPOLIS. Derivation :—"Αλσος, garden ; πόλις, city	..					

If you do not approve of any of the above Names, what Name do you suggest ?

Signature of Shareholder_____"

V

The actual development of the estate started in the summer of 1904 with the construction of the first roads, the waterworks, and the first part of the sewerage scheme. The gas works were begun in the following year, with a portion of the private railway sidings. The electricity supply station was not erected until three years later, and, largely owing to the scattered area of the town, current is still only supplied in the central business area.

The arrangement of the company with the original farm tenants was a matter of some importance as soon as development com-

¹ This voting card is a curiosity in more than one respect.

The Garden City

menced. The whole of the land was in occupation, on, as a rule, a yearly tenancy; for obvious reasons it was advisable to disturb the tenants as little as possible. If the company had had a large area thrown on its hands at the beginning it would have suffered serious loss of revenue, for which it could have secured no corresponding advantage. Fortunately, it was found possible to enter into agreements with all the principal tenants, with one exception, to take over not more than one-tenth of the area of their respective holdings in any one year, on three months' notice being given and on payment of reasonable compensation. By this means the greater part of the land remained in the farmers' occupation until it was actually required by the company.

The laying out of the land for building plots on the existing roads, and on the first of the new roads, was begun without delay, and in the first summer more than fifty plots were let and houses started. The whole of this early development took place in the outer area of the town, the idea being that building should work towards the centre, instead of from it. The old villages and the old roads were thus made the starting points of its growth. The advantages of this method of development are beginning to be appreciated, and will be more appreciated in the future, though it involved the company in considerable initial outlay on all the public services.

The policy of the company was to deal with the land and not to undertake house building; it left that to private persons and companies. Special building regulations, based on the Local Government Board's model bye-laws, were prepared, and plans and elevations of all buildings to be erected had to be submitted to and passed by the company.¹

VI

That the company should retain in its own hands the freehold of the estate was inevitable, in view of the fact that the economic basis of the Garden City scheme was the securing to the inhabitants

¹ Extracts from clauses of particular interest in the Letchworth Building Regulations are given in the appendix.

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of the increased value of the land arising from the creation of the town. A memorandum on the subject issued to the shareholders in April 1904 is interesting as showing the early intentions of the directors : " The Garden City Company, in proposing to found a new town for industrial and residential purposes, is not entering into a land speculation ; it does not desire to reap for itself the profit which will accrue from the conversion of agricultural land into building land, and from mere building land into the site of a well-developed town, and it has carefully deprived itself and its successors of the power to do so. The articles of association of the company provide that all profits beyond a cumulative dividend of 5 per cent., which is regarded as a fair return to the shareholders, shall be used for the benefit of the town and its inhabitants. *As the profit, therefore, cannot be retained by the company, it will go to the tenants in one way or another.*

" Under these circumstances it is obvious that for the sake of the tenants themselves, as well as in order to secure the fulfilment of the objects of the company, it is desirable to apply the most equitable conditions of land tenure possible both in respect of public and private interest. This can only be accomplished if the company in the first place maintains the full control of the development of the town, and in the second place adopts the system of tenure which will secure, as far as possible, under the established laws and customs of the country, that the increase in the value of the land shall benefit those who create it. *As the greater part of this increased value is due to the social activities of the people as a whole (i.e., in their collective capacity) it is in this capacity that they should receive the benefit, and not as private individuals.*

" In order to secure these ends it is considered preferable to adopt a leasehold system of tenure. . . ."

These extracts from the memorandum give a good idea of what was in the minds of the promoters of the town, and the policy thus outlined has been maintained by them to the present time. The form of the lease and the covenants contained therein have been subjected to very considerable discussion ; the contribution by Mr. Aneurin Williams to the appendix of this book should be carefully considered by readers interested in this subject. Leases

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are now granted for 99 years at a fixed rent ; for 999 years at a rent revisable every 99 years ; for 999 years at a rent revisable every ten years ; and, for factories only, for 999 years at a fixed rent.

The question of the benefits to the Garden City of the leasehold system has often been raised, and many unsuccessful attempts have been made to secure its modification, but there can be no question that it provides the only means of carrying out the Garden City proposal. The number of people who demand freehold land either for residential or business purposes is small, apart from the mere land speculator ; and for all ordinary purposes the leases granted by the Garden City Company, which are in a particularly simple form,¹ are quite unobjectionable. It cannot be said that the absence of facilities for acquiring freehold has prejudiced the development of the town in the least degree.

It must be remembered that in creating the Garden City the promoters had no statutory powers beyond those that an ordinary landlord possesses, and the only possibility of their being able to exert the control over the growth of the town which the peculiarities of its development required rested upon the existence and preservation of those powers. Mr. Howard himself, in his book, recognised that in its position as landlord resided all that the Garden City required to make it what it was desired to be. In discussing the administration of the town, he says : " The powers possessed by the Central Council are, it may be noticed in passing, more ample than those possessed by other municipal bodies, for whilst most of these enjoy only such powers as are expressly conferred on them by Acts of Parliament, the Central Council of Garden City exercises on behalf of the people those wider rights, powers, and privileges which are enjoyed by landlords under the common law. The private owner of land can do with his land and with the revenue he derives from it what he pleases so long as he is not a nuisance to his neighbour ; while, on the other hand, public bodies which acquire land or obtain power to levy rates by Acts of Parliament can only use that land or spend those rates for such purposes as are expressly prescribed by those Acts. But Garden City is in a greatly superior position, for, by stepping as a *quasi* public body

¹ The special clauses are quoted in Appendix K.

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into the rights of a private landlord, it becomes at once clothed with far larger powers for carrying out the will of the people than are possessed by other local bodies, and thus solves to a large extent the problem of local self-government.”¹

The memorandum by the company, to which reference has been made, pointed out one of the advantages that the leasehold system of tenure would secure to the inhabitants of the town, and indicated that Mr. Howard's idea of a “rate-rent” might still be regarded as ultimately realisable: “It is further to be borne in mind that the rents paid by tenants are not absolutely outgoings as rents ordinarily are, but a considerable proportion will be available for purposes which are paid for in existing towns out of the rates. Moreover, the actual cost of public services will, it is obvious, be less in a city planned from the beginning, and the land of which has been bought at agricultural value, than in ordinary towns where public services are carried out only after land, still in private ownership, is at a high price and numerous vested interests have grown up. Putting these two facts together, it does not appear too sanguine to expect that as soon as there is a thriving town on the Garden City estate no rates will be needed, the rents proving ample to cover all public services, and as the profit which prospective tenants may hope to derive will depend upon the success of the company in securing the rapid establishment of the town, it is hoped that intending settlers will recognise that their interests are in common with those of the company.”

VII

The first event which set its mark upon the town was the Cheap Cottages Exhibition organised by the *Country Gentleman* and the *Spectator* newspapers in 1905.

The exhibition was held with the idea of proving by actual demonstration that it was possible to build a cottage for labourers in rural districts at a cost of £150. “If the agricultural problem and the problem of rural depopulation are ever to be solved they will be by the £150 cottage,” said Mr. J. St. Loe Strachey. It

¹ *Garden Cities of To-morrow*, p. 72.

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was not surprising that with such objects the exhibition commended itself to the directors of the Garden City Company, and that they should have offered a site for it on their estate. It was the first cottage exhibition to be held in this country, and any attempt to solve the problem of cheap cottages could not fail to appeal to them. It came at a time when they themselves were faced with a demand for cottages, and the problem of building cottages at cheap rents was one which it was already obvious was going to be serious in Garden City. The fact that the Garden City problem was not the same as that of the rural landlord did not deter the company from helping to organise the exhibition, which was opened on July 25, 1905 by the late Duke of Devonshire. One hundred and twenty-one cottages were erected on an area north of the station, and entered for the exhibition. With the powerful co-operation of the editors of the two papers mentioned, combined with the attraction of the name Garden City, it was visited by no less than 80,000 people during the three months it remained open. The visitors included those who were genuinely interested in the problem the exhibition was supposed to solve, but a large proportion were members of the public on the look-out for a cheap week-end cottage.

There can be no question now that the exhibition, while it gave the place a tremendous advertisement, did no little harm. It set a rage for cheapness from which Garden City has hardly yet recovered ; it gave the town the character of a village of tiny week-end cottages not very well built ; its curiosities of planning, construction, and material, which had nothing in common with the objects of the town, gave the place a name for cranky buildings ; and, finally, it brought crowds of people to see a Garden City which had not yet been built, and gained the place a bad reputation before it deserved it. Everything that was good for the exhibition and helped towards its success was bad for the town. The style of the cottages, the site chosen for them, and their arrangement on the site, remain to-day as evidences of the most disadvantageous incident in the early history of the town.

The exhibition provides an example of the way in which town planners, particularly when working on so large a scale as at Letchworth, are at the mercy of circumstances. When Garden City

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was planned the designers could never have contemplated that the sort of buildings comprised in the exhibition would be erected on the site chosen for them. The plan was, therefore, modified at the start, and many of the ideals with which it was prepared must have gone to the winds. It will be a happy day for Letchworth when the exhibition is forgotten and all its consequences are destroyed.

VIII

The first residents were professional and business men with their families. As already mentioned, the existing highways allowed for the immediate letting of sites for private houses, while the more complete development required in the industrial area held back the working-class element for some time. These early residents were, for the most part, the enthusiasts who had been looking forward for years to the founding of the town. They came to it in a spirit of adventure, they discovered it as though it were a new land. That they were not lacking in enterprise is evident from the risk they took in becoming pioneers. They did truly look upon the land with an eye of faith, and it was no wonder that, coming to build their homes under such novel conditions, they should expect to see arise not merely a new city but a new civilisation. They hoped to revise all, or nearly all, social institutions; they discussed, as middle-class people will discuss, the reform of religion, art, and social polity, and the application of what they call the best modern knowledge to education and all the affairs of life. They left nothing alone. They even turned to agriculture, being among an agricultural community, and considered how that industry might be improved. Their ideas, though familiar enough to all readers of the papers, were startling to people unaware of the spirit of the times. Of course, they confined themselves to the discussion of these weighty matters. As practical men they went by the train to town every day and did their business; but at night, and on Sundays, they met together in one another's houses and talked as men talk all over the modern world. There was, in a word, nothing strange about them. Journalists came for a hurried ride

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round the town on the look-out for extraordinary things, and possessed of a characteristic readiness to swallow any wild tale the first facetious person might present to them. They described many wonders of which the people of the town had never heard. The visitor saw, it may be, a notice announcing a lecture on "The Immorality of Private Property," to be given probably by a conservative anxious to combat socialist fallacies ; and he (or, more likely, she) would go away to write about the colony of Letchworth communists and their dangerous freethought ideas. As a result the place came to mean, to the journalistic mind, a home of curious and comic people, and some such idea still seems, at times, to cling to the persons who write in the press. For a long time a reporter could not look at the roads of the town, or the sewers, without seeing something fantastic, and the most prosaic thing he would enlarge into the grotesque. The plain truth is that the Letchworth people were in the past, as they are in the present, very ordinary people, the sort of English people you meet in every town. They were, as they are still, living on a new land ; they hoped, as all wise men would have hoped, to see some new and more perfect thing arise on that land than it had been their lot to see elsewhere, and they did their best to make that new thing actual.

That there was excitement, wonder, and delight among these early residents is true enough. They found themselves set down between three or four little villages in which no new houses had been erected for generations. The adjacent towns were ancient, sleepy, and indifferent. The countryside was falling to decay. The thirty-four miles between them and London were sufficient to make the great city a little remote, and as they wandered over the fields on which the new town was to come, it was no surprising thing that they laid great plans for the future. The romance of their situation, standing at the beginning of a new movement in English life, was such that they had been men and women of curious stuff if they had not been affected by it. No new thing was too strange for them to expect, they had the feeling that on the morrow anything might happen. There was nothing socialistic or un-English among them, but they enjoyed a freedom and an opening for new activities which was both strange and delightful. The



LYTTON AVENUE



ICKNIELD WAY

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experience was something not likely to be often repeated, and the first year in Letchworth will not easily be forgotten by those who were fortunately there.

It was in such a temper and with such a buoyancy of mind that the town began, and we can see how these venturesome and eager residents brought into being the spirit of the place which gives to it its own special character. Their daring hope of a city that should be something like Whitman's city of comrades could not be fulfilled ; but their fine enthusiasm, to make their place unlike other places, is likely to remain in the town a long while before, if ever, it be destroyed.

IX

At the end of 1905¹ the Heatly-Gresham Engineering Company, Ltd., and the Garden City Press, Ltd., became the pioneers of the Garden City industries. They were followed by a few other firms, and in 1907 the printing and bookbinding works of Messrs. J. M. Dent & Sons, Ltd., and Messrs. W. H. Smith & Son and the Arden Press were brought to the town. By that time the population had reached about 4300. This was an immense advance. In three years the population had multiplied eleven times. So sudden an influx of people, many of them of the artisan class, though there was still a large proportion of other residents, swamped the first-comers and their idealistic notions. The new class of people were tradesmen, mechanics, manufacturers and their managing staffs, with many London business men. They brought extraordinary vigour into the town. The "old residents," as they now called themselves, set out to conquer the new arrivals, but they only partially succeeded. The new people, for the most part, went their own way ; and though here or there some of them went over to the pioneers, they mainly held aloof. Well, as it happened, the new people settled down in the place, and the free and spacious life, which those who had come in the early days valued so much,

¹ Messrs. Ewart & Son, Ltd., took three acres of land for a factory in 1903, though the building was not erected until 1911. This was the first piece of land let by the company.

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began to assert itself ; and almost without their knowledge, and often against their will, the fascination of the town grew upon these new settlers and they entered into its spirit.

In the rapid development that proceeded up to 1907 the numerous social activities of the town began to be formed. In the early days the associations of residents for various purposes were informal and loosely organised. It was not until pressure was felt from the new working population that these activities gained settled form. The early residents talked, the new residents had little patience with talking ; they wanted something done. What they wanted done were, needless to say, very ordinary things. They wanted their churches, their sports clubs, their co-operative society, their trades unions, their Conservative club, and the usual agencies for amusement and instruction, to which they had been accustomed in the towns from which they had been transplanted. They even wanted a public-house. They got these things slowly, and some of them, notably the public-house, they have not secured even yet. But they at once got committees, on which the " old residents " were particularly active. All kinds of tastes found expression in these committees, and societies sprang into existence concerned with every possible human interest. For a time every man was a committee-man. The committee-man became a joke. When the novelty of having three or four committee meetings every night and a meeting for every hour on Sunday wore off, the number of committees per man diminished, and although Letchworth has probably always had more societies for the size of its population than any other town in the country, these activities soon became more normal.

X

For some years the town had practically no representation on the local bodies. Owing to the slowness of the operation of the registration laws there were only a hundred or two voters on the register out of a possible thousand. The early residents had created a Residents' Council to give them some sort of organisation and a means



STATION ROAD

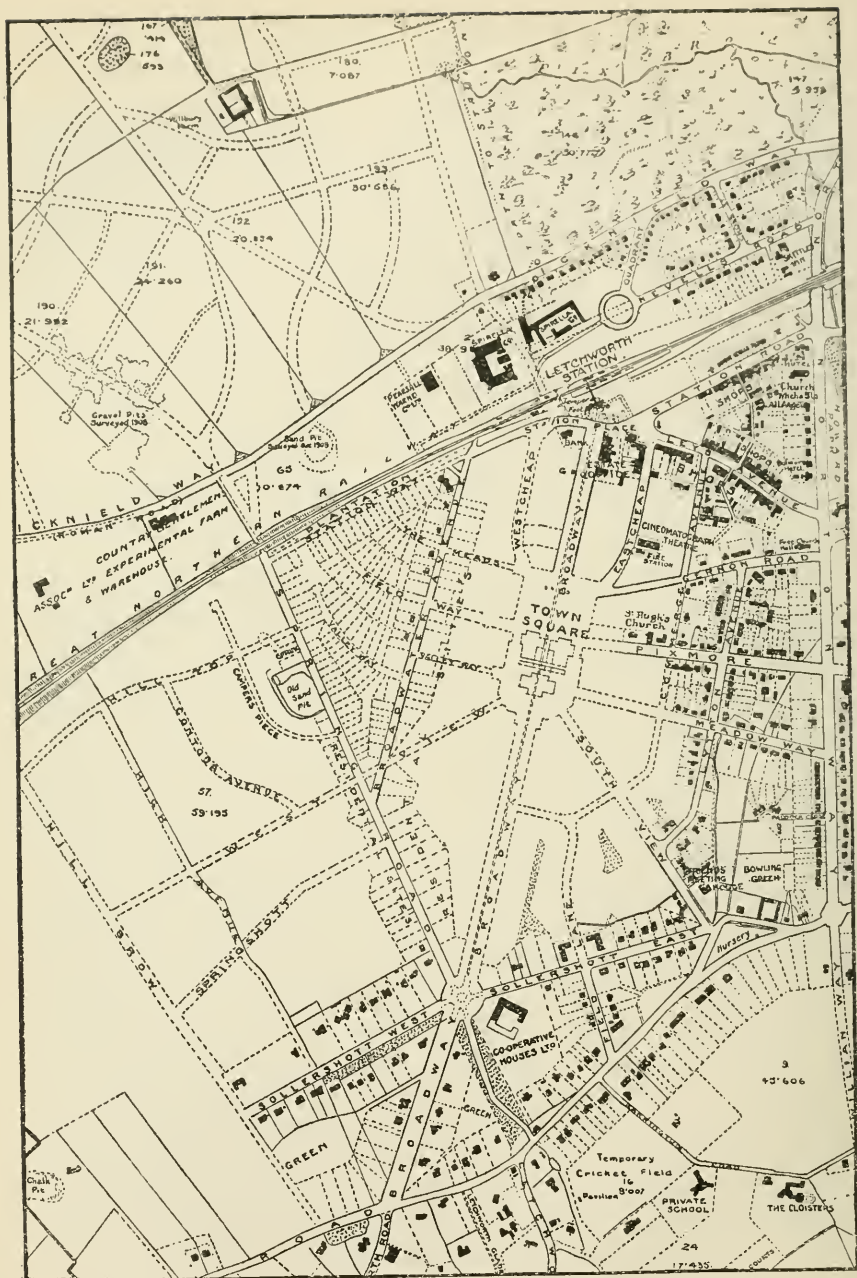


PIXMORE HALL AND INSTITUTE

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of communicating with the railway company, the Garden City Company, and the local authorities, but when, with the increased population, it was sought to extend the operations and the recognition of the council, the attempt broke down, and the council, although it subsisted, remained hardly a serious factor in Letchworth life. The parish meetings of the three parishes in which the town was comprised were the only means of local corporate activity, and they were too cumbersome and separate to be called into use. In 1908, on application being made to them, the Local Government Board made an order consolidating these three old parishes of Letchworth, Norton, and Willian, and creating the new civil parish of Letchworth, with a parish council of fifteen members. The first parish meeting took place in March 1908, and the first council was elected in April, the Right Hon. Sir John E. Gorst being its chairman.

The powers of a parish council are exceedingly limited, and under ordinary circumstances would be inadequate for a town, but it is probable that this form of local government will last in the Garden City for some time to come. With the First Garden City, Ltd., undertaking the development of the town in a public-spirited manner, working in harmony with the parish council, and in excellent relations with the rural district council (on which increased representation has been secured) and the county council, there is little need for the additional expense necessarily involved by the creation of an urban district. The question of cost is not, however, the most important factor ; the chief thing is the successful completion of the Garden City, and so long as the simplicity of the constitution and machinery of the local authority helps towards that end (as, up to the present, it undoubtedly has done) the town will be wise to maintain it. The Garden City Company, through its officials, through its inspection of plans and buildings, and through its administration of the estate, is undertaking many of the duties of a local authority, while the creation of such a body to perform any or all of those duties at the present stage might involve overlapping and duplication of work. If, however, at any time the existing harmonious relations were disturbed, it would be to the interest of the town to secure wider powers.



Plan of Garden City, showing the Town west of Norton Way (1913).

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XI

The story of the growth of the Garden City may be summed up thus : In 1904 the beginning ; in 1905 the exhibition ; during 1906-1907 the rush ; in the next two years the pause ; in the three following years the emergence of the town ; and to-day, ten years after, the place discloses its own unmistakable character. Or it may be told, more dryly, in figures, thus :

Year ending Dec. 31st	Number of New Buildings	Estimated Value of New Buildings (various owners)	Estimated Population
1904	36	£12,000	400
1905	280	90,000	1500
1906	507	237,500	2500
1907	970	314,000	4300
1908	1104	340,275	5250
1909	1206	365,300	5700
	(including factories and workshops)		
1910	1334	404,500	6500
	(including factories and workshops)		
1911	1564	462,700	7300
	(including factories and workshops)		
1912	1761	517,705	7912
	(including factories and workshops)		

XII

After ten years, we say, the place shows signs of its character. To all towns there belongs this curious quality derived from the generations of men. The changes of the years modify their external characteristics, but the spirit that pervades them, the subtle essence that is their soul, remains. Where it comes from, who can tell ? Certainly, it is not made by the will or cunning of man. The modern " town planner " talks of seizing upon the soul of a town and giving expression to it, but they who really believe in the soul do not talk like that. In the case of the Garden City we have a town, with no tradition or history, that has sprung up in a single decade ; and yet, for all its short life, it possesses a



STATION PLACE



LEYS AVENUE

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spiritual atmosphere which cannot be ignored. The identity of Letchworth is already established. We may try to set down in a book, as we are trying now, something of what the spirit of the place really is ; but that spirit being so new and so young is shy and elusive. We get a touch of it here and there, but our impressions are fragmentary. We feel something of it in our social intercourse ; the friendliness, tolerance, and good sense of our neighbours suggest it ; our town itself, as a whole, bears the marks of its influence. When we consider how the town grew, and how the people came to it, we can realise, better, perhaps, than in any other way, its rare quality ; for, as might be expected, Letchworth owes a great deal to the circumstances connected with its origin. That it was not built, as it were, by accident ; that it did not originate in the work of the speculator, as so many towns have done ; but that a high purpose, and a motive which was born through the liberation of the spirit from the hideousness of Victorian towns and houses, dominated the minds of its founders, could not fail to set free some forces of adventurous endeavour, and bring fine and robust qualities to its making.

It has to be remembered that at Garden City, as in all other towns, there are people who have come to it from choice and others who have been driven by necessity. It is not to be expected that the two sorts of people will like the place equally well and bring equal contributions to it. One is not disposed to enjoy what one is driven to. But out of all the variety of the people, out of their interests, their personalities, their conflicting wills, there is being built up a common interest and a sound community ; so that even now there is nothing more characteristic of Letchworth than the way in which its people look upon the town and the sense of possession they have in it. Already people come to speak of the " spirit of the place," as though it were something known and understood of all, and the best recommendation that any man can give to any new movement is to show that it is in accord with that spirit.

Spontaneity, democracy, and comparative lack of conventions are among the fine assets of the place. The traditions of old towns, though remembered and followed by those who like them, do not belong to the new town. Letchworth has the fine opportunity of

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making afresh the traditions of town life. Truly they need making afresh, for the towns of England have lost their old pride. Instead of looking into the past, and following on the lines laid down by the generations that are gone, we in Letchworth, in our new home, have to look to the future and build for it. In our social relations, in our arts, in buildings, and in institutions, we have but to know what our own needs are and to remember the demands of posterity. To repeat again in our midst the stupid mistakes of other places would be, one says with all submission, a pitiful folly. We surely have the wit to create suitable conditions for ourselves, which is all that is required. One does not look for Utopia ; one does not anticipate any measure of perfection or anything " advanced." But if the people who live in the place will have the courage in their houses, in their social and civic life, in education and art, to demand that which pleases them, and not merely the " correct " thing, they will gain some satisfaction for themselves, and their children will bless them. There is no danger that Letchworth will be too much unlike other places ; the danger is, perhaps, all the other way.

As one walks about the town the thing that strikes one most in the peculiar quality that attaches to the place is how far removed it is from the suburb. And when one looks for the reason for this, one finds that the most complete explanation lies in the fact that the industries, although confined to their own particular area, have kept the town balanced. Without its industries, one feels convinced, Letchworth would never have maintained its character. Its extension as a merely residential district would have resulted, in the end, in the usual suburban stagnation. Its vigour and enterprise would have gone. Its liberal social life would have congealed into the dull cliques of suburbia. A sound industrial element is essential to the wholesome life of a town. The recent industries of Letchworth have introduced a good class of artisan, and the industrial population now consists mainly of men engaged in the various branches of the engineering, printing, bookbinding, and building trades, together with many small trades. With this industrial element as a basis, the quality of the place, its temper and spirit, improves with time.



NORTON WAY AND STATION ROAD



NORTON WAY

The Growth of Garden City

The present writer remembers on a day in the early summer of 1904 standing with a farmer watching the men at work excavating for the first new Letchworth road. "Well, I'm letting them cut up my field, but will it come to anything?" and he laughed as he said it, for he knew that he had the world with him in his scepticism. Standing on the same spot to-day one can see to the south and east clustering roofs of houses, while to the north, much farther away, like a little town to itself, are the white and red cottages of Norton. On this very field of nearly two hundred acres of fine rich land, which then grew crops of corn, and even so late as a year or two ago was brilliant in spring with sainfoin, there is the new station of the Great Northern Railway, with the first buildings of Broadway, the post office, the bank, and the new offices of the Garden City Company. To the left of the station are the shops of Station Road and Leys Avenue, with the streets that run into them, Eastcheap, Commerce Avenue, and the Wynd. Beyond the shops, to the east, are the houses of the workers, and, still further on, the workshops and factories. South and north of the station are the residential parts. The unfinished aspect of the streets is giving way—in some cases, in Norton Way and Meadow Way, for instance, has already given way—to order and harmony. Time and nature have co-operated with man to give the town beauty. There is, however, none of the fearful exactness, the almost painful sense of tidiness, and the self-conscious æstheticism that one experiences in the new suburb at Hampstead. Garden City might learn much from Hampstead, but the individuality of the town is so strong that it can bear what would have brought disaster to the suburb. There are, for instance, many unquestionably ugly houses in Letchworth; ugly, not in the sense in which the speculative builders' houses are objectionable, but because the people who put them up had little care for the artist and his criticism, so long as their houses suited them. Well, because they were built to meet some man's needs, and not to suit the speculator who looks to his profits, they are not offensive. The super-sensitive may be distressed, but the robust-minded will see in them something of humanity. Anyhow, such houses make the place comfortable; they destroy the idea of a model city with restrictions, regulations and rules for every detail

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of life ; the houses on one pattern, the occupants also made mechanical.

Here we get a suggestion of that liberality and freedom which belong to the new town and are most certainly of its spirit. Incomplete as the place is, we can already know what fine and subtle qualities it holds within it. In the ten years of its infancy it has come to be a centre for the renewing of urban life. What it teaches in the way of new methods of town-building, people from every country in the world come to learn. It has gathered a community able, if it will, to compass great ends ; and without great wealth, or great men, with no extraordinary aids, it is an inspiration to all who work for the future. " The hopes of the people are the future of England," says a recent writer ; and the hopes bound up with Garden City are the bringing back of beauty and nature into the common life of men.



Hillshot: a Street of Small Houses

CHAPTER IV

GARDEN CITY ARCHITECTURE

"Every noble city has been a crystallisation of the contentment, pride, and order of the community."—W. R. LETHABY.

I

THE architecture of a city resides not merely in the number and beauty of its public buildings, in those parts of it that are magnificent and fine, but in the general shape and structure of the place, in its streets, and in the fitness of its buildings for the domestic and necessary functions of the home. For this reason, the architect—that is, the designer of individual buildings—is only one of the several contributors to the making of that master-art on which, in Morris's words, "all the other arts depend."

The architect and engineer, together with the men who employ them, are the builders of the city. They are none of them free to do what they will, because environment determines the conditions under which they work, and one cannot act without the others. The architect has to satisfy his client, the client has to trust to the knowledge and ability of his architect, and they both have to depend upon the engineering skill which makes the town habitable. The city that is made is the result of their combined activities. And there are other important factors which have a bearing upon the result. There is the actual builder himself, the "contractor" in our modern speech, and his workmen; there is the general standard of the community; there is, also, the subtle influence that people exert over their surroundings, making or marring the forms of things; and there are other factors too numerous to mention.

In considering, therefore, the "cumulative architecture" of any place, the "town architecture," as Mr. Paul Waterhouse calls it, or what has been more narrowly and clumsily named "town planning," the operation of all these factors, one upon the other, in producing

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the general result, has to be borne in mind. A town is not made by one man, nor by one man's ideas. It is an organic thing, the product of the efforts, aims, and desires of many men. It arises out of the working of time, and the imaginations of its builders. Its architecture is determined by natural conditions, by the needs, real or supposed, the traditions, the limitations, the culture, of those for whom it is made, and of those who make it.

A fine town cannot be built even by taking thought beforehand, any more than it can be built with money. Unless there be a fine intention among its builders, and a fine, exact, and experimental knowledge among them also, there can never be brought about any fine result. It is, to use the words of Pater, the "skilled cultivation of life, of experience, of opportunity," which goes to the making of a town, as it goes to the making of man.

II

The Garden City, then, will require something more than a clever plan, a supply of experts, money, and prudent management, before it achieves anything that in the wider architectural sense is worth while. It needs "a clear common purpose and a great and steadfast movement of will," working in a community of well-disposed and venturesome people, able to seize the opportunity it provides of breaking away from the past and making the beginnings of a new town life, out of which will come, in due time, a new town architecture. The making of that architecture will be gradual, not by any striving for effect, not by taking any aim at the artistic, but in the natural and inevitable course of realising the solution of the practical problems of its development, it will arise.

It is too early yet to speak of the existence of a Garden City architecture. Only the outskirts of the town have been touched, the building of the larger part of it, its centre and heart, has not yet been begun. What we can do is to observe the quality and manner of the building already done, to see how far it meets actual requirements, to find out what general principles, if any, underlie it, and attempt, perhaps, to estimate the prospects of the future.



ON NORTON WAY

Garden City Architecture

III

The idea of the promoters of the Garden City was not to build an artistic town. Their intention was to effect the improvement of individual housing. They were not artists, but reformers, men and women who wished to see a clean, healthy, and sanitary place, where men might live and work under decent conditions. Their whole idea was to build a town in which the best possible physical conditions for a community might be secured. They were not in the least preoccupied with questions of æsthetics. As Mr. Raymond Unwin himself said, "we must first see that our citizens are decently housed."

In its first prospectus the Garden City Company declared that the chief advantage anticipated from the new departure it was making was "the provision of hygienic conditions of life for a considerable working population," and in the most recent statement of its objects we read: "The building of Letchworth as a residential and industrial town, planned on scientific lines, was undertaken to show that when the best of modern knowledge was devoted to the problems of urban development, it was possible to build a town in which the evils of overcrowding and insanitary areas could never arise."¹

In the very year that the town was founded the chairman of the company gave evidence before the Departmental Committee on Physical Deterioration, when Garden City was considered as a means of providing "conditions of life for the artisan and townsman, consistent with sound health for himself, his wife, and his children," and on these grounds the committee specially mentioned the scheme, with approval, in its report.

This original idea of providing good houses has been the governing factor in the development of the town. Its first considerable architectural blunder, the Cheap Cottages Exhibition, was due to the anxiety of the directors to assist in solving the cottage problem, and whatever danger there has been, from time to time, for the place to get artistic, and to emulate, for example, the prettiness of the

¹ *A Short Account of Letchworth (Garden City)*, p. 9. March 1913.

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Hampstead suburb, has been held in check by the pressure of the industrial population and by its demand for essentials. Had the Garden City been a residential town only, it might, had it met with any success at all, have probably done little more than has been done at Hampstead, if indeed it could have done as much.

As it is, æsthetics have been kept in the background. If anything, the promoters have been too much afraid of them. The officials have gloried in being practical, commercial, and unartistic. They have reckoned it a virtue in themselves that they had no taste. This was going too far in the opposite direction, but it is at least a witness to the thoroughness with which Garden City has maintained its serious purpose ; and it may be remarked that its cottages and factories are, so far, the most valuable contribution to its architecture, for they serve their ends successfully, and at the same time are good to look upon.

IV

It must not, however, be thought that æsthetics have been entirely ignored. Before development commenced in 1904, the Garden City Company issued a pamphlet to intending builders in which mention was made of certain means by which beauty might be secured to buildings in the town. As the pamphlet is of some interest the major part of it is given in full :

“GENERAL SUGGESTIONS AND INSTRUCTIONS REGARDING BUILDINGS OTHER THAN FACTORIES ON THE GARDEN CITY ESTATE

“The directors of First Garden City, Ltd., are convinced that the high standard of beauty, which they desire to attain in Garden City, can only result from simple, straightforward building, and from the use of good and harmonious materials. They desire as far as possible to discourage useless ornamentation, and to secure that buildings shall be suitably designed for their purpose and position.

“The company will prepare building plans of the sites on those parts of the estate intended to be first developed. Upon the plans will be set out :



NORTON WAY SOUTH



NORTON WAY NORTH

Garden City Architecture

“(a) The areas within which houses may be erected and by which the boundaries of the land intended for front gardens, for traffic, or for recreation purposes will be defined.

“(b) Any provisions as to the height of buildings, the extent to which trade buildings will be permitted, and to which buildings may be erected behind the main buildings.

“The company will also pay attention to such matters as security from fire, the public traffic which is to be expected, health, water supply, and drainage ; also to the need for dwellings corresponding to local conditions, and to ensuring that streets and squares shall not be disfigured. The position of houses must be adapted to the configuration of the land, and must be such that an adequate supply of sunshine in the rooms is secured. The First Garden City Company will itself, or by contractors, construct the streets and footpaths ; provide sites for recreation spaces and public parks ; and reserve sites for school buildings and churches.

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“In certain cases it is not proposed to enforce a hard and fast building line, but some simple regulation as to building area will be made. Houses may be set back or forward within certain limits, and may be set at varying angles where this would be advantageous. A building line will be suggested in the first place by the company, and any alteration which the intending builder proposes to make will be carefully considered in each case. Particulars will be provided to the applicants for each plot together with the tracing of the plot agreed to be taken.

“It should be remembered that a sunny aspect for the main rooms is almost as important as ample air space, and that other considerations, such as fronting the houses or cottages to the road, are of little importance in comparison. In Garden City ample frontage will be provided, and it is hoped that builders will not think of erecting those common, unsatisfactory rows of narrow houses, with unsightly ‘backs’ projecting behind to the exclusion of air and sunshine for which the chief reason has been the high cost of frontage in existing towns. One suitable arrangement will be found to be that of having no out-buildings at all ; the w.c. or

The Garden City

E.C. being under the main roof and entered from the porch or from a lobby outside.

"The buildings must have their external walls and roofs constructed with approved materials. The common arrangement of a faced front with inferior materials for sides or back will not be encouraged in detached houses. The directors prefer that one quality of material should be used throughout each house, and one character of building maintained on all its sides.

"If plots are fenced, it should be with hedges of approved character, and simple temporary fencing will be permitted until such hedges have grown sufficiently to form an effective fence. All fencing must be subject to the approval of the company's surveyor.

"The promoters believe that by encouraging quite simple buildings, well built and suitably designed and grouped together, they will be helping to secure for the Garden City a special charm and attractiveness by methods which experience shows are better calculated to ensure them than the lavish use of pointless ornament. They quite realise, however, that in good hands tasteful ornament used with due reserve may add much to the interest and beauty of the town, and would welcome such work accordingly."

The "suggestions," it will be noticed, are couched in very general terms, and when they were incorporated in the company's building regulations, extracts from which are given at the end of this book, they still retained much of this vagueness of definition.

They show, however, that it was the intention, or, at least, the hope, of some among the promoters to carry out certain ideas of an artistic kind. They evidently failed to secure practical application of those ideas, probably because they were unable to convince the men associated with them of their soundness, for apart from the issue of this pamphlet no further attempt was made to set an æsthetic standard for the town.

The prohibition of what Morris called "one of the greatest curses of the age," blue slates, and the insistence upon red roofing tiles for all domestic buildings, are the only artistic matters to which any serious attention is paid, though it should be mentioned that the position of all buildings is subject to the company's approval. Apart from certain hygienic and sanitary considerations, including

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the limitation of the number of houses allowed to be built on each acre, which varies according to the size of the house, there is plenty of scope for the pursuit of individual taste. The uniformity of roof-covering, though it may seem a simple matter, and although it was fiercely objected to at one time, is certainly one of the chief elements in making whatever beauty the town possesses. Without that one thing to bring the buildings together the town would lack unity, and what is poor within it would appear poorer still. The red roofs give colour to the town, and in whatever light you see it, and from whatever aspect, it is possible, because of them, to get a picture that is altogether pleasing.

In the early days the consulting architects to the company, Messrs. Barry Parker and Raymond Unwin, set out to exert some control over the general design of the houses and to enforce the æsthetic interpretation of the building regulations, but that attempt soon weakened as objections came to be raised to it, and for some years it has practically disappeared. While that control was stringent, however, there were not many plans finally rejected, though some were considerably modified, for if the client were sufficiently determined he could put up much what he liked, as the buildings in the town bear witness.

It may be regretted from some points of view that this control broke down, but it broke down because it attempted the impossible. No one architect, however able, could control a town, or lay down laws for its growth. And when the condition of architecture in this country is considered, its separation from common life, its lack of resource, its distance from first principles, its confused ideas, and generally the incompetence of those who practise it, it must be obvious that Mr. Raymond Unwin, venturesome as he is, was undertaking a task too great for any man.

It may be that in the future an attempt will be made to set a standard to which buildings in certain areas of the town will be required to conform. The first signs of it are seen in the rule already made that buildings on the Broadway, up to the Town Square, are to be of a Georgian character. That some control over the design of buildings in the centre of the town is necessary few will dispute. As Mr. L. March Phillipps said recently, the scientific

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point of view is forced upon town architecture. In "a house which is one of a row of houses and is faced by another row over the way," we are "bound to consider the general principles of architecture."

To what extent this control should be exercised, as well as its nature, are matters upon which there is likely to be much controversy. Without entering upon any discussion of the matter here it may at least be said that the principles to which observance is to be demanded should be few, simple, and fairly rigidly maintained, and that the adoption of a style, even a Georgian style, should not form part of them. The reason that a Georgian style is required in the Broadway buildings is said to be due to the effort to secure, in that part of the town, a formal treatment, as a contrast to the buildings in other parts of the town; but while the intention is praiseworthy, the buildings already erected in conformity with that rule show that an attempt to enforce a "style" is bound to fail. A rule as to the height of buildings, the building line, and material to be used is likely to produce better results. And of all styles, the Georgian is most out of keeping with the peculiar character of the town.

V

The real danger of Garden City architecture is not so much in the conflict of styles, as a deficiency in matters of mere construction. In this the Garden City suffers from an evil common to our modern building. The song in the *Garden City Pantomime*, for all its intended exaggeration, contains a good deal of pertinent criticism of the new building everywhere :

"When the lamps are lit, and the shadows flit, and a balmy breeze from Norway
Is dodging the screen you've erected between the fireplace and the doorway,
When the rain and the sleet and the hailstones beat through every chink of the casement,
And the plaster falls from the mouldy walls, and the damp wells up from the basement,
Perhaps you reflect that your architect was a bit too Arts-and-Crafty,
And you wish that your lot had been cast in a cot that wasn't quite so draughty."

It is exaggerated, but it is sufficiently like the experience of many of us for us to relish its humour. Good sound building, which should be always readily available, is, in reality, most difficult to get. It is probably because our building is weak that we bother about style at all.

The causes of this indifferent building are many, and one of them



HOWARD HALL AND GIRLS' CLUB, NORTON WAY



HOWGILLS (SOCIETY OF FRIENDS' MEETING HOUSE), SOUTH VIEW

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is undoubtedly the craze for cheapness. A man who would not grudge an extra sovereign for a good overcoat, will not spend a few extra pounds on a serviceable home. But the problem of construction is not merely that of a parsimonious client. It is equally, if not more, due to a school of architects who, however well-trained they may be presumed to be in theory, are woefully lacking in an understanding of the practical needs of the day. The present writer would not venture such a remark on his own authority : it is what architects themselves admit. But any one who has observed the building of Garden City, or of any new area, must have had forced upon him the obvious fact that the architect has been none too richly equipped for his work. He can design, he can make nice-looking plans, but he cannot build because he is out of touch with materials, their uses and costs. Of this there is abundant testimony. Ask an architect to design you a £500 house and you will get an estimate on his plans for £750 or £1000. And even then will he swear that the place will be structurally sound ? It is the same if it be a £5000 house, or a building for £10,000. The overwhelming experience of those who have to do with the modern architect is that he is too much of a drawing-office man, too little of a practical man. In how many cases does the architect settle the elevation and leave everything else to his assistants ? It is no wonder that we get no great work, and only here and there what is reasonably passable work. In a recent little book by Professor W. R. Lethaby, the last chapter of which should be learnt off by heart by every one who has to do with the building of Garden City, this is said : " We have to aim at a standard of ordinary good quality ; damp, cracked, and leaky ' architecture ' must give way to houses as efficient as a bicycle."

That is good enough as a motto for the builders of Garden City. If they would adopt it, and act upon it, they will have in the end a town of which they will have no cause to be ashamed.¹

¹ The remarks contained in this and other sections of this chapter might be applied generally to architecture and building in this country. It would be wrong to suppose that they apply specially to Garden City, beyond the fact that the town being wholly new provides an unusually complete example of modern domestic work, and that both the strength and weakness of that work may, perhaps, be more clearly seen there than elsewhere. To those who care for what is alive, the fact that modern work has weaknesses will not condemn it ; for all work has some kind of weakness. Garden City building is supremely interesting in spite of everything, because it is the work of our own time.

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VI

The chief thing to be said about Garden City architecture is that, just as the town itself is of a new kind, its architecture must be new. In its actual form it is different from other towns, as it differs from them in its origin. The problem which has met all the builders of the town up to the present, and will ever remain the outstanding problem of the place, is how to build for a town which is not a town in the mediæval sense, and yet not country either. It is a town in which some qualities of rural life are to be preserved.

The crowded and closed-in features of the old towns, occasioned by reasons of defence, have given place, in the Garden City, to the first strictly modern attempt at building. We have paid no attention to town architecture in this country since the time of the wars, and we have heedlessly perpetrated the old way of building houses as close together as they could be got, without regard for modern conditions, with only meagre consideration for health, and utterly oblivious of order and beauty. In the middle ages, and even so late as the eighteenth century, there was good reason for crowded buildings, but since that time our building has been blindly done, governed only by notions of commerce and false economy, so that Morris did not exaggerate when he said that our "cities are a disgrace to us, and the smaller towns a laughing stock."

Until Garden City was founded in the first years of the new century town architecture and town planning were unknown. There was no attempt to direct modern knowledge and science to the creation of a new form of town suitable for the changed circumstances of the time. The town-planning movement which has arisen in recent years is but the uncertain beginning of the comprehensive treatment which the gigantic problems of town development demand. Who can believe that the new suburbs, the Garden Suburbs as they are called, in imitation of some of the features of the Garden City, provide a satisfactory method of building? The Garden City itself is but an imperfect attempt at solving the problem, but the important point is that it is a step forward, and not like the new suburbs, merely marking time.

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The method of development adopted at Garden City is to spread the houses over the land within the town area and preserve the limits of the town ; the maximum number of houses allowed per acre being twelve, ten, eight, six, or four, according to their size. This means that most of the houses are detached, surrounded by gardens, or, when they are not detached, that a large piece of garden land separates one group from another. For this kind of development it is obvious that the ordinary town house is unsuitable. Here and there it is possible to find such houses looking forlorn and forsaken until their gardens grow sufficiently to hide their shame ; but the ordinary houses in Letchworth, so far, are country houses, designed for a rural setting. This type of house is equally out of place, for the freedom allowed to the architect in the country cannot be enjoyed in a town where the influence of the buildings which form the immediate surroundings has to be considered.

The problem at Garden City is, then, the discovery of a new kind of town architecture. For this discovery endless experiment is necessary, but if each builder does the best that is in him, if thought and care be given to each separate piece of work, and if the general effect be not totally ignored, it is possible that in time the Garden City will get what it wants. But for this we need the spirit of adventure and men who are not afraid to break new ground. Those men will base their work upon Georgian, Queen Anne, or Jacobean, they will find their inspiration there, or wherever they can, but the work they do will be the result of their own taste and feeling. What is wrong with our architecture is not so much that each architect thinks for himself and expresses himself, as that it is imitative, uninspired, uninstructed, and mean. It is not that there is too much activity in the minds of architects ; it is that there is too little.

Garden City is so large and the demands of utility are so severe upon it, that it is unlikely that the general result of such activity will be in any way fantastic. If sound building be made the first consideration, and if simplicity, severity, and a firm determination to meet the actual requirements of the town be maintained, it will be impossible for the general result to be wrong. The architects who have been at work for the past ten years show signs that they have mastered in some degree the difficult and intricate problem they

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have had before them. To them we must look for the new work—to them and to the cultivation of a more critical interest among the general body of inhabitants. Already in Letchworth there are indications of a common interest in building and architecture which might be a valuable aid in the future building of the town. He would, indeed, be very dull who could live in the Garden City and not have his interest aroused in some measure by the most marked and most obvious feature of the place. And although it cannot be said that there is, at present, any effective common criticism, or that any attempt is made to maintain any kind of architectural opinion, yet there is no subject so certain to attract a crowded meeting, or lead to such heated argument, as architectural matters when brought before a Garden City audience. In any other time but our own this common interest would have easily provided the ground from which would have sprung many practical results, but in our day the hope which lies in it is that it may become a civic consciousness influencing directly and indirectly the work of the builders. “If we are ever to have a time of architecture again,” says Mr. Lethaby, “it must be founded on a love for the city, a worship of home and nation.” The civic spirit, the love of the people for their own place, will be the atmosphere in which the building of the city will become a work of art. For a time or a place does not become artistic merely by taking thought for the morrow, merely by copying tricks of style, but art flourishes when the atmosphere in which it can live is present, as a flower blossoms in the air and sun. “Beauty is the complexion of health,” and in a healthy community, healthy in mind and purpose as well as in body, there will be discovered as its work is being done signs of those delightful qualities which all sincere work possesses.



SOLLERSHOT, EAST



MEADOW WAY

CHAPTER V

SOME TYPICAL GARDEN CITY HOUSES

"Homes for human beings. Cosy, comfortable, bright homes, where father and mother and the whole troop of children can live in safety and gladness, feeling what a happy thing it is to be alive in the world—and most of all to belong to each other—in great things and in small."—HENRIK IBSEN, *The Master Builder*.

I

"IT is natural," says Mr. Arthur Symons, "that much of the most intimate charm of the city should linger in its villas and gardens," and it is very true of Garden City. The town itself has a fresh and provoking personality which you will like or dislike very decidedly—you begin, perhaps, by disliking it, and end with something like affection for it, in spite of yourself. But to know the town well, certainly to like it much, you need to cultivate a familiarity with some of its houses. Separate houses make up a town, just as separate men make up a people; and just as you need to know at least one man before you feel the quality of a community, so you must know one or two houses before you begin to know a town. You cannot, in a word, judge a town from the outward appearance only; you must be on terms with its heart.

II

In making the acquaintance of Garden City houses there are a few things that strike the stranger at once. The first is that the buildings show quite plainly that they are not the work of the speculator. The majority of people in this country are housed by syndicates which operate over large areas of land and lay them out in accordance with the demand of the market. Their profits are made, as a rule, not so much out of the houses themselves (they are often sold below cost) as out of the greatly enhanced price they

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put upon the land. The houses are built to suit anybody. They express the ideals of the average man and to that extent they are utterly successful. Of course, they are vilely built. They all bear the touch of the commonplace, dull, and greedy minds of those who make them, and of the respectability of those for whom they are made. They are on a level. They reduce whole districts to mediocrity. They cry aloud for destruction. There is nothing of this in Garden City. A row of bungalows is the one witness to the speculator in the town, and they are so insignificant that they are lost in the place. How delightful it is to find a town in which all the houses are the products of individual taste, good, bad, and indifferent, but interesting and alive! Thank God the speculator has not yet come to exploit the town, and pray God he never will.

The houses have all been built by private persons for investment or for their own occupation. Fifty per cent. of the residents live in houses of their own.¹ Elsewhere you will hardly find one per cent. This is of great significance in the making of the character of the place. It affects it more powerfully, perhaps, than anything else. The house a man has built to live in will express his own personality, it will be part of himself. And the individual houses being so directly a product of personal life make the demeanour of the town alert and eager.

It is not merely in the details of construction that individual touches will be seen, but in the atmosphere which pervades the house, the very look that it has. When a house is occupied by those who have given thought and care to its building, and who cherish it as their own, it will have a very different appearance from a hired house lived in by those who are indifferent to it, or even actually hate it. A house which gives happiness to its owners and to those who shelter within it has an air of rejoicing, just as certainly as a house which is neglected shows signs of decay. It is a strange thing that without human beings to live in it who have some pride and pleasure in it, a house will soon dilapidate. A house is like the

¹ This excludes artisans and the working-classes generally. A proportion of them have their own cottages, purchased through building societies or under the Small Dwellings Acquisition Act, but the majority are housed by cottage building societies.

Some Typical Garden City Houses

human body, it needs a soul. If it be left empty for long it becomes the prey of despair and every gloomy spirit.

The ownership of a house is an enrichment of life. It completes one's interests and brings security and comfort. Every man should own his house. Otherwise he is but one who exists on the sufferance of a landlord. A borrowed house is only next in indecency to borrowed clothes. The time will come, maybe, when we shall as little think of the one as we do now of the other. How is it possible to base a home upon a three years' lease? A home needs foundations, deep and secure, which only time and some element of property in the building can give it. The walls in which the experiences of life come to us are dear and precious, and we would not easily part from them. Who does not pass with regret the scenes of his childhood, the home in which he was brought up, and grudge them to the possession of strangers? It is only fitting that what is so valuable should be secured as personal property. We live more profoundly in our own house, we are more ourselves. Its rooms are like companions, for in them abide memories that years cannot disturb.

In giving encouragement and practical facilities to the growing number of people who, dissatisfied with their present "makeshift homes" (in Wells's words), are beginning to desire a house after their own hearts, the Garden City is contributing most surely to the remaking of town life. It is making the private ownership of the house normal to the mass of men. It is bringing men back to the full possession of their own homes.

III

There are few things more exciting than the building of a house. First, to choose the site for it, to get just the right outlook from where your principal windows will be, to be at just the right angle of the road, to work the old trees and the hedge and the shape of the plot into the general scheme, and to take account of the neighbouring houses and get your own in right relations to them. And then, having made up your mind about the size of the house and

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the money you can spend on it and having found your architect, you discuss the plan and get immersed in practical details, and find that unless you are to spend three times as much money as you possess you will have to forsake, one after the other, many of your cherished fancies. Then, after much argument and many sketches, you will get an estimate from a builder, and if you recover sufficiently from the shock that will give you, the house is on the way to being built. One day the work begins ; scaffold poles, planks, barrows, bricks, lime, cement, sand, tools, and men take possession of the plot, the foundations are dug out, and you see the first mark of your house upon the land. It looks very small, so small that you believe the builder has made the mistake of building it only half the proper size, but he convinces you by actual measurements that the mistake is your own. Then, day by day, the house arises until the roof is on and the floors are laid and the skeleton filled in ; and all the time the house is held in possession by gangs of men who sing and talk and cook and eat their meals and swear in it. At first the work is rapid, you think to yourself that the place will be finished well within the stated time, but as it nears completion progress becomes slower and slower until it seems almost to have stopped.

How is it that while the mere building of a house seems so quickly done, its decoration and the finishing touches take so long a time ? Does anybody know ? Certainly it is true that it is one of the most difficult things in the world to get the last workman out. And it is not merely a question of the time you take yourself in deciding about fittings and colours. It must be the inherent reluctance of the builder to finish his job. Anyhow, it is all part of the fun of having your own house, and at last, after many delays and after the breaking of fifty promises, the keys are put into your hand, and behold, the place is yours.

What a delicious experience it is ! You walk about the empty rooms thinking of how you will furnish them, you anticipate the life you will live in them, and, as Novalis says, " all anticipation is joyful." This is the house you have wanted, this is the place you have long desired. You will never have such delightful feelings as you now have, when all that you will do in the house, all that the house will be to you, is matter for dreams and airy plans. It is



EASTHOLM



ON SPRING ROAD

Some Typical Garden City Houses

something of the same pleasure that Laurence Sterne had when he wrote in his *Journal to Eliza* these charming words: "I have made you a sweet Sitting-room (as I told you already)—& am projecting a good bed-chamber adjoining it, with a pretty Dressing-room for You which connects them together—and when they are finished will be as sweet a set of romantic apartments, as you ever beheld—the sleeping-room will be very large—The dressing-room thro which you pass into your Temple will be small—but big enough to hold a Dressing Table, a couple of chairs, with room for y^r Nymph to stand at her ease both behind and on either side of you—wth spare room to hang a dozen petticoats, gowns, &c.—& shelves for as many Bandboxes—Y^r little Temple I have described—and what it will hold—but if it ever holds You and I, my Eliza, the room will not be too little for us. . . ."

IV

The typical Garden City house is a small one. Very large houses do not, at present, find a place in the town, and though they may come they will never be very characteristic. The small house of from six to twelve rooms is the type. "Small rooms or dwellings set the mind in the right path, large ones cause it to go astray." That is a saying of Leonardo da Vinci, which we may well remember with pleasure at Garden City, though our houses are small from necessity rather than for any philosophical reason. Those who build them are not usually rich, and economy is a serious matter with such, especially economy in a house. Expenditure on a house is not money spent once and for ever. It is an expense that goes constantly on. According to the size of your house will your annual charges be, painting, distempering, renewing of woodwork, and all the other costs of maintenance. But apart from all questions of economy the small house is attractive from an artistic point of view. It gives such opportunities for getting charming effects out of curtains, wallpaper, and furniture, and of getting the whole house treated as a unity. That is a matter often overlooked in small houses; there must be a uniformity of treatment throughout or the

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point of the smallness of the house is lost. In a big house you can vary your treatment, but in a small one all the rooms must be considered as a whole. And architects are somehow more at home in the small house and can do themselves more justice. Many of their productions in this sort are triumphs.

Everybody knows the "Garden City cottage," though it was invented long before the Garden City—a white, roughcast Tudor-like building, with red tiles, gables, green paint, water-butts, and casement windows. It is certainly representative of the town, and it is as certainly a great advance on anything that came before it in the last century. In spite of the severe criticism it has met with, which, on the ground of its inconvenience and incompleteness as a home, is often well deserved, this type of building is a witness to the attempt of the people of our time to get as far away as possible from the kind of houses their fathers lived in. In the case of the house, what is good enough for the fathers is not good enough for their children. With all its faults the new kind of small house is a great advance.

It is, undoubtedly, capable of much improvement in the way of increasing its efficiency and in the avoidance of waste space, especially in the roof. Some architects are so extravagant that they are unable to design the smallest kind of house without wasting money and valuable space; other men are just as economical. There is no reason why every bit of space should not be utilised, and if an architect wants a long roof he should do something with the space under it.

V

A great deal of the criticism of the new architecture, and the artistic house, is due to its unsuitability for Victorian furniture. Much of the furniture of the last fifty years will not fit the new houses, and any eye can see that it is hopelessly out of place. It is natural that when they come to the new houses people who have never before had reason to find fault with their furniture should blame the houses for any incongruities or inconveniences that are manifest for the first time. The wardrobes that will neither go up the stairs nor in at the windows; the mahogany sideboards



A COTTAGE WITHOUT A FRONT FENCE, ON ICKNIELD WAY



ON THE BALDOCK ROAD

Some Typical Garden City Houses

that go badly with the green paint and white walls ; the horse-hair chairs that have lost whatever comfort they possessed ; the occasional tables, the carpets, bedsteads, curtains, antimacassars, chiffoniers, that looked so well and served so well and were so admired in the old house are all positive witnesses of something being wrong in the new one. When almost everything we have cries out in protest against it, can it be wondered that the new house is condemned as cranky, and that those who built it are laughed at? It is only after a time that we come to realise that the fault is not with the house, but with what has been put into it. After making every allowance for the shortcomings of the house, it is obvious after a time, if not at once, that furniture made for bad houses, such as the Victorian houses were, is also bad. We can escape from the Victorian house, perhaps ; as all of us at Garden City have done. But it is not so easy to escape from our other possessions. Matters of sentiment or considerations of finance may cause us to hesitate before getting rid of the old things, even when they do not actually prevent any such action. Yet what is needed is clear ; and at the very worst we let the old, heavy, ugly things go bit by bit, and replace them by what gives us more pleasure. We realise that we want a new style of furniture for the Garden City house. One of the explanations, perhaps, of the present craze for antique furniture is that people realise how hideous nineteenth-century furniture is, and, not trusting their taste in the new designs, and believing that what is old must be good, they find the way out of their dilemma in buying impossible old stuff.

It is a little gain that people should have forsaken the horrible productions of Curtain Road for spurious antique, but only a little one. They have got to learn, though how they will learn it God knows (though time may teach them in the end), that the honest work of living craftsmen is better than the dishonest imitation of dead men's work. The furniture that gives most pleasure, and that is proper to the Garden City house, is that made by men of our own day. Such furniture is not cheap, it is, perhaps, much too dear to bring it completely within the reach of all, but it is the only furniture that does not lose value with age, but carries always with it the price that was first paid for it.

The Garden City

In the house a man builds for himself it is possible to have a good deal of built-in furniture. There is no doubt that other furniture can never surpass it for durability, economy, fitness, and utility. Many homes have it in Garden City, and their number will certainly increase as the convenience of it is appreciated.

Well, whatever our home may be, or however we may furnish it, "Heaven send us," in Mr. Belloc's words, "the liberty to furnish it as we choose. For this it was that made the owner's joy: he had done what he liked in his own surroundings."

VI

The houses illustrated in the following pages are representative of Garden City, and, with two exceptions, are the work of architects practising there. Examples of other houses could have been given, and many illustrations of them will be found in this book, but it has been thought better to confine this chapter to those of characteristic rather than exceptional buildings, particularly in view of the limited space available.

It seems necessary, however, before passing on to these typical houses, to mention the building that is, so far, the chief architectural work in the town. That building is the Cloisters, designed by Mr. W. H. Cowlshaw. In the sense that it would be difficult to find another building anywhere in Europe to put beside it, the Cloisters is typical of Garden City. And in the sense that the architect deliberately set out, in the endeavour to carry out the wishes of his client, to build something that would be as new as the town itself, the Cloisters is still more typical of the town. It is a building that is hard to describe. It was projected "with the idea of making possible an open-air life," and is arranged both for public gatherings and as a residence. In point of size it is the largest private building in the town. As a whole it is rather bewildering; though in detail it can show things of extraordinary beauty, reminding one of Italy and the early Renaissance, rather than of anything to be found elsewhere. But that is in detail only. The building is hardly as satisfactory as that altogether. It is still



THE SWIMMING BATH AT THE CLOISTERS

Some Typical Garden City Houses

experimental and unfinished, however, and not until it is completed will it be possible to judge it fairly.

Of the really typical houses, which is our proper subject, it now remains to speak. It has been said already that the examples we are able to give are not exhaustive. Some choice work by other architects is to be found in the town, notably by Mr. M. H. Baillie Scott, Mr. Charles Spooner, Mr. Halsey Ricardo, Mr. Geoffrey Lucas, and Mr. C. Harrison Townsend; but the architects whose designs are given have contributed most to its making. The houses selected vary considerably in size and accommodation, and range in cost from £200 to over £2000, but as they are all in private occupation and are illustrated by the courtesy of the owners, it is not possible to discuss questions of cost in connection with them, even if such discussions were of any practical value. It is worthy of note that all the houses illustrated were built to suit the requirements of their owners and that they are not show or exhibition houses. They are occupied, with one or two exceptions, by the owners themselves, and are of interest largely because they are not the subject of advertisement. Catalogues of houses, whether issued by, or on behalf of, architects, builders, agents, or owners, are of small value compared with an account that owes its origin to some notable features in the houses described. These houses have been selected because they please the writer of this book, and in endeavouring to do them justice he is merely giving expression to his own feeling with regard to them, in the hope that what pleases or interests one man will very likely please and interest many.

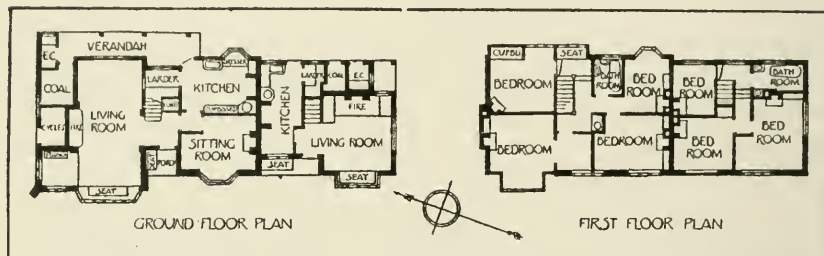
The chief general features of the Garden City house are that, as a rule, considerable attention is paid to its aspect, and that the principal rooms are planned to secure the maximum of sunlight and the best view. Then, rooms are often arranged to be thrown together so that the drawing-room and dining-room or, more often, the hall, may, when desired, form one room.

Bathrooms are usually of a good size, and in many cases hot and cold water and a sink waste are provided in the bedrooms. But, of course, what is put in or omitted from the house is largely a question of cost or of personal taste. The thing is that there is no lack of ideas.

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(1)

A PAIR OF COTTAGES ON LETCHWORTH LANE



Parker & Unwin

Letchworth

These cottages on Letchworth Lane, designed by Messrs. Barry Parker and Raymond Unwin, were among the earliest of the new buildings erected in the town, and they have always formed a very charming part of it. They stand well back from the road, with just enough room for small kitchen gardens at the back between the building and the hedge. They are cottages in the true sense, not small houses like some of the other buildings illustrated in this book. What is more important, they are good examples of Garden City architecture, being buildings suited to the spaciousness of the place, yet proper to the town. The plan is straightforward, with all the offices under one roof. The most delightful feature about them is that their interiors and exteriors harmonise; for once in a way it is possible to tell from the outside what the inside will be like. That is probably due to the fact that they were designed by the men who intended to live in them; so far as one of them is concerned it is occupied by a man who designs his own furniture, and it is the living-room of this cottage that is illustrated.



A PAIR OF COTTAGES ON LETCHWORTH LANE

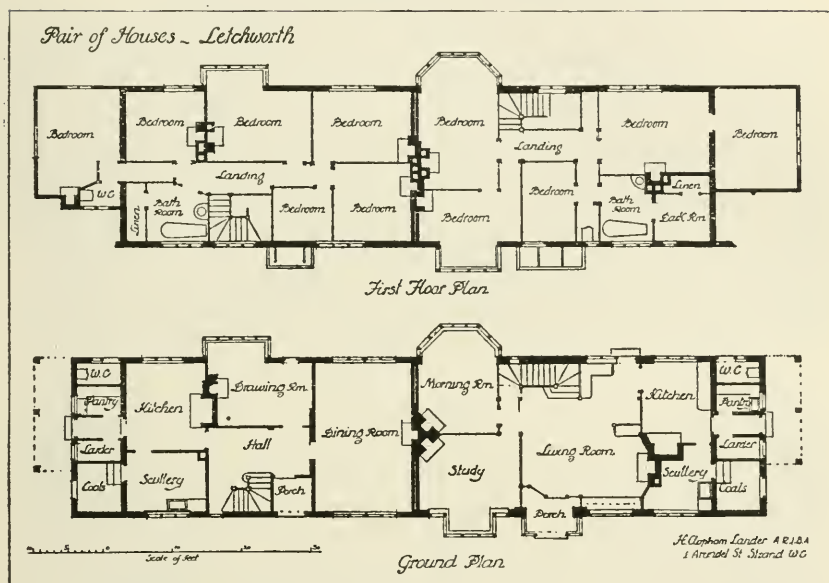


A PAIR OF HOUSES ON BALDORK ROAD

Some Typical Garden City Houses

(2)

A PAIR OF HOUSES ON BALDOCK ROAD

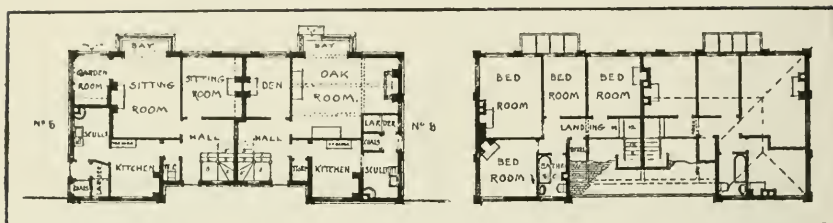


These two houses, on the Baldock Road, also date from the town's beginning. They just escape from being cottages, and if they are compared with the pair just illustrated the difference between the house and the cottage may, perhaps, be seen. They are on a site with a long frontage, and were designed to occupy the greater part of the frontage in order to secure the maximum amount of sunlight in all the rooms. Passages are avoided as much as possible, and the rooms are arranged to minimise labour. Both are houses for families. The large living-room with the stairs leading out of it is interesting.

The Garden City

(3)

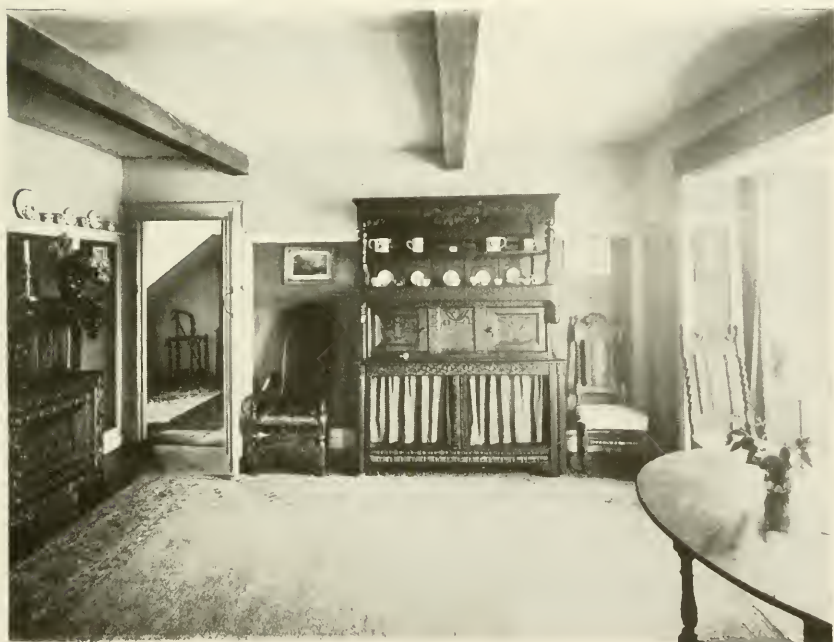
A PAIR OF HOUSES ON NORTON WAY



Allen Foxley

Letchworth

The site of these two houses abuts on Norton Common, and the view over the common and the country beyond suggested making as many rooms as possible to face the west. It is this aspect of the houses which is shown in the photograph. The forecourt makes, perhaps, a more charming picture, but does not suggest the character of the place so well. The many windows on the west side will be noted; the pilaster treatment was thought necessary in order to strengthen the wall. Necessity, therefore, governed the whole design, and the result is particularly pleasing. The plinth and pilasters are of purple Hemel Hempstead bricks; the rest of the walling in Fletton bricks, roughcast, and coloured a pale cream. The two houses differ somewhat in plan. The one illustrated was designed to take a collection of old English oak furniture; the walls are hung with grey-brown canvas in panels in simple wood framing, and the floor above is carried on unwrought oak beams.



A PAIR OF HOUSES ON NORTON WAY

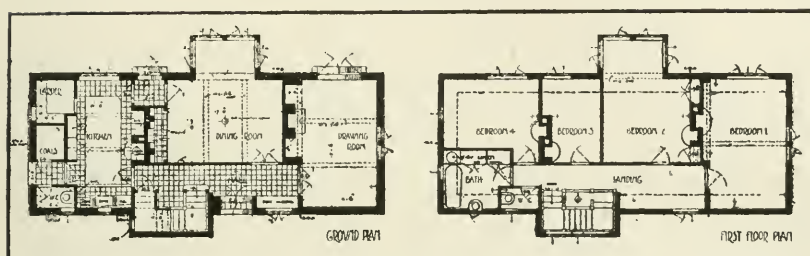


A HOUSE ON SPRING ROAD

Some Typical Garden City Houses

(4)

A HOUSE ON SPRING ROAD



Aylwin O. Cave

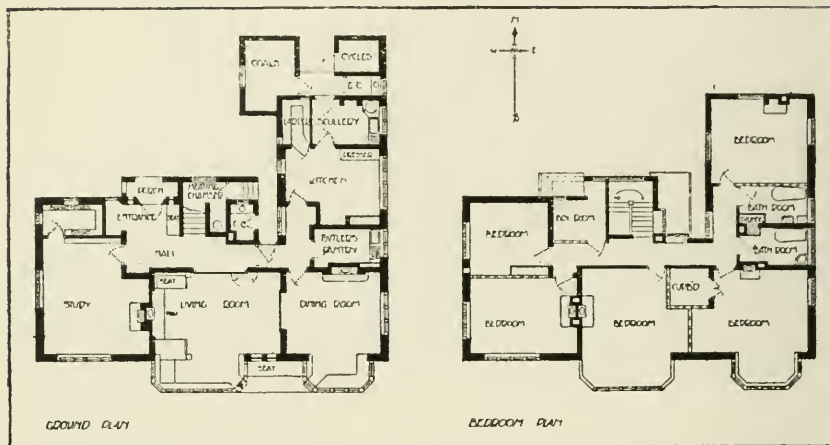
Leitchworth

At the corner of Spring Road and Sollershott is this house built by Mr. Cave. It is very charmingly done, and is excellent in every detail, the construction being well considered and admirably executed. It is built of hand-made local bricks, with hollow walls, the facings being in red with tile courses sparingly introduced. The bay mullions are of buff-coloured local pavings. There is a brick fireplace in the dining-room, built of local yellow bricks and red tile courses. Heaped fires are fitted throughout. The furnishing is mainly modern, with a few antiques which happened to belong to the owner. Morris cretonnes are used for hangings. The garden, upon which the principal windows look, has a sunk tennis lawn, backed by great elms. It is well secluded from the road, and the entrance to the house is on the north. Without any exaggeration the house fits a plot which was not without its difficulties for the architect.

The Garden City

(5)

A HOUSE ON GARTH ROAD



Parker & Unwin

Letchworth

One of the features of "Glaed Hame" is that the house is so arranged that the living-room, dining-room, and hall can be thrown into one large room whenever necessary. By this arrangement the convenience of the large room and the comfort of small rooms may be enjoyed alternately. The sliding doors which make the smaller rooms have no unfinished appearance, but are part of the furniture of the house, and are worked into its decoration. The entrance is on the north, but none of the rooms have a north aspect. There is a large garden, and the view to the south and south-west over Letchworth Park takes in many miles of gloriously wooded country. This house has no drainage of any description under the surface of the ground. Earth closets are used on Dr. Poore's system, and other drainage is carried from the sinks and baths in open iron channels laid on the ground level; a few yards from the house it is distributed by similar perforated channels over the kitchen garden. The position of the channels can be changed as required. Rain-water is treated in a similar manner.



A HOUSE ON GARTH ROAD

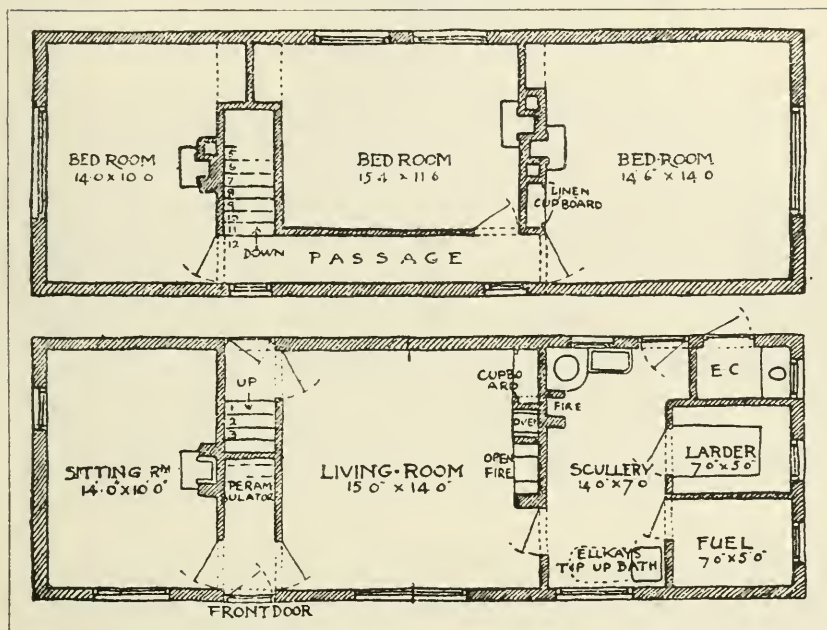


A COTTAGE ON WILBURY ROAD

Some Typical Garden City Houses

(6)

A COTTAGE ON WILBURY ROAD



A. Randall Wells

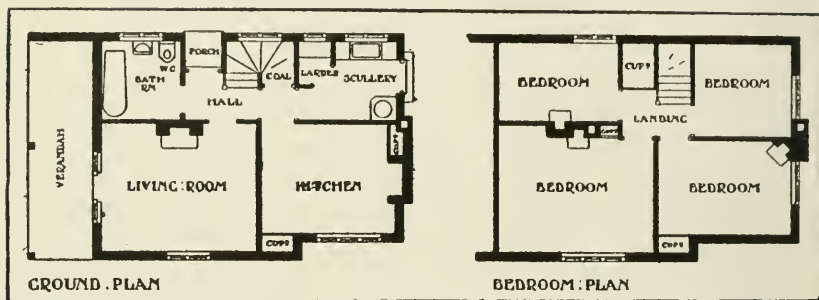
Westminster, S.W.

The atmosphere of this little cottage on the Wilbury Road holds the fragrance that comes from old and delicate things. In the garden are the favourite flowers of the cottager growing in fine disorder and in abundance; and in the rooms are old china and simple furniture set off with gay curtains. Who would believe that eight years ago the plough travelled where this cottage stands? It is difficult to realise that the place is so young, for there is nothing of that harsh bareness which belongs to new buildings and is so hard to cover and wear down. The truth is that where a cottage has the daily presence of its owner, and where there is ceaseless effort to convert the walls of a house into a home and empty land into a fruitful garden, much can be done in little time. It is the personal touch that tells. This cottage is a witness that simple things are all that are needed in the making of the perfect home.

The Garden City

(7)

A COTTAGE ON WILBURY ROAD



Bennett & Bidwell

Letchworth

This cottage is on the south side of Wilbury Road where the ground slopes away to the common, and the aspect from its windows is at all times one of the most delightful to be imagined. The little coppice of fir trees at the bottom of the field where the common begins is a source of constant pleasure, for the trees are always full of colour; in the winter they create a picture of soft tones that would make the house worth living in even if it were less comfortable than it is. All the main rooms have this outlook, and only such necessary rooms as the bathroom, larder, and scullery, together with the window from the stairs, face the north, where a high hedge of thorn and wild rose and blackberry is a screen from the road and the houses opposite. To the north there is nothing to be seen, and therefore there are no windows that matter. The great merit of the house is its compactness; there are no corridors or passages, and except the tiny hall and the stairway every bit of floor space is in the rooms. The exterior decoration is white, and the rooms have plain white walls with the woodwork in dark green. The furniture throughout is of oak, mostly modern, stained dark and oiled.



A COTTAGE ON WILBURY ROAD

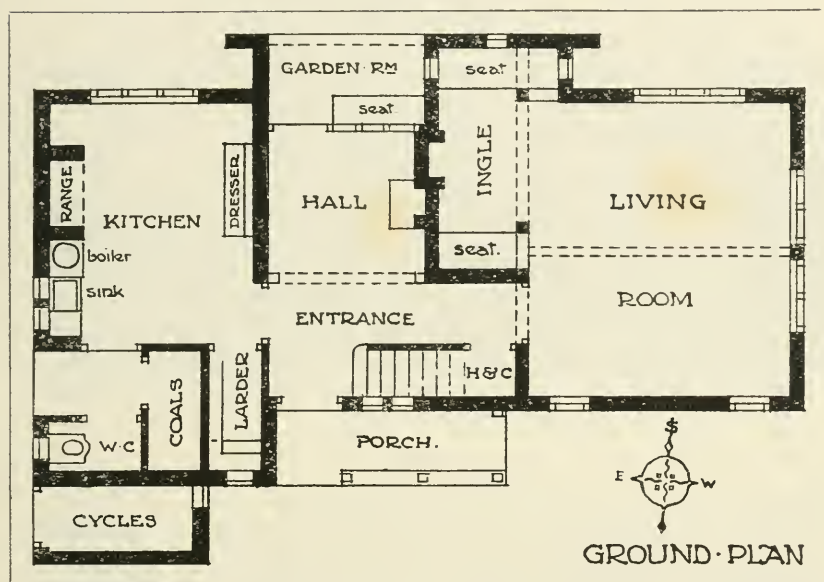


A HOUSE ON CROFT LANE

Some Typical Garden City Houses

(8)

A HOUSE ON CROFT LANE



C. H. Hignett

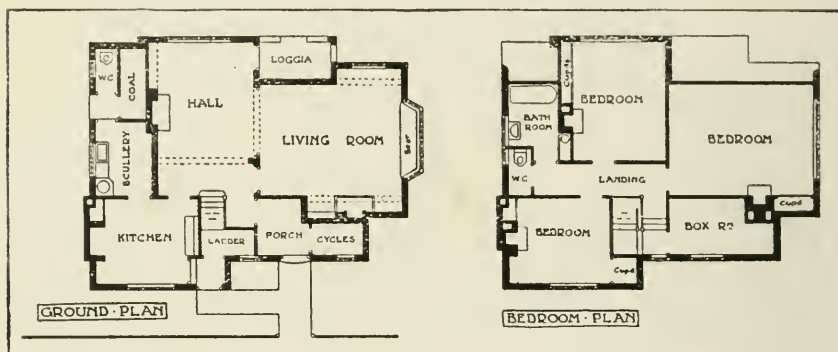
Letchworth

Croft Lane still preserves its rural character, and the architect has made a house and garden to fit the scene. Here, as in a few other Garden City houses, thatch is used with excellent results. The lines of the roof, as in all thatched houses, are very pleasing. It is a pity that thatch is not more generally practicable as there is no roof-covering to equal it in beauty. The "garden-room" is one of the features of the house; it opens out of the hall, so that it can be extended into the house in the summer, and it provides at all seasons a means of enjoying the open air. The living-room with its cosy ingle is an inviting room, a room for winter and a fire and living at one's ease. The appropriate furnishing of the house adds to its charm.

The Garden City

(9)

A HOUSE ON SOUTH VIEW

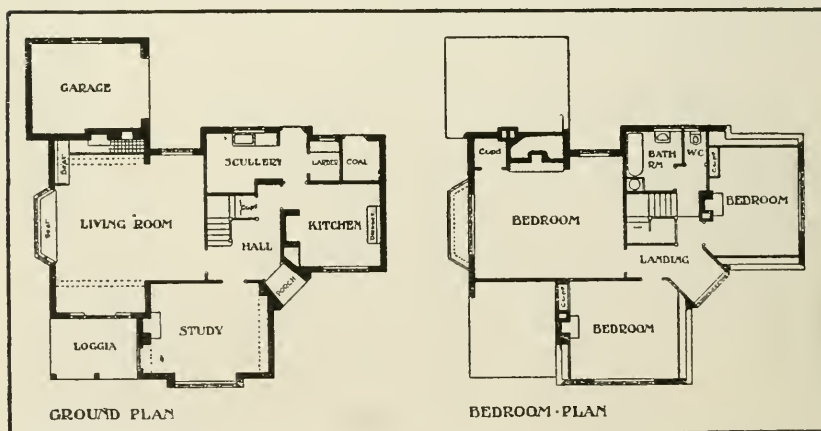


Bennett & Bidwell

Letchworth

(10)

A HOUSE ON NORTON ROAD



Bennett & Bidwell

Letchworth



A HOUSE ON SOUTH VIEW



A HOUSE ON NORTON ROAD



A HOUSE ON WILBURY ROAD

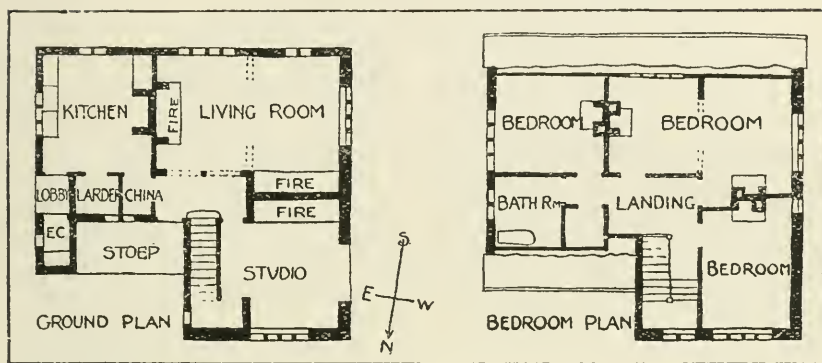


A HOUSE ON HITCHIN ROAD

Some Typical Garden City Houses

(11)

A HOUSE ON WILBURY ROAD

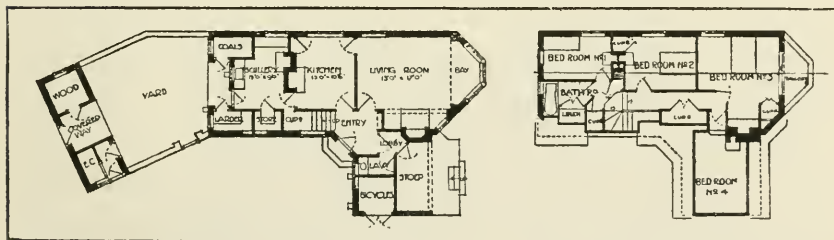


Parker & Unwin

Letchworth

(12)

A HOUSE ON HITCHIN ROAD



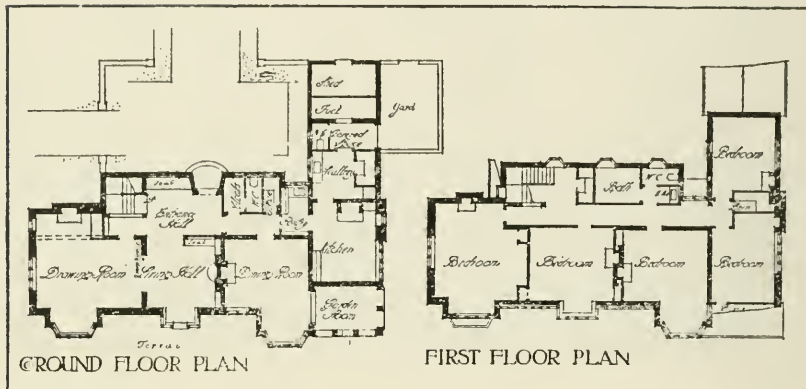
Smith & Brewer

Gray's Inn Square, W.C.

The Garden City

(13)

A HOUSE ON GARTH ROAD

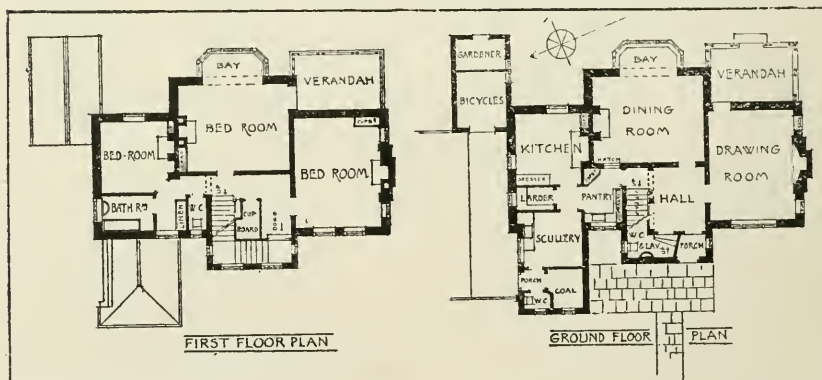


C. M. Crickmer, F.R.I.B.A.

Letchworth

(14)

A HOUSE ON BROADWAY



Allen Foxley

Letchworth



A HOUSE ON GARTH ROAD



A HOUSE ON BROADWAY



FOUR HOUSES AT SOUTH VIEW

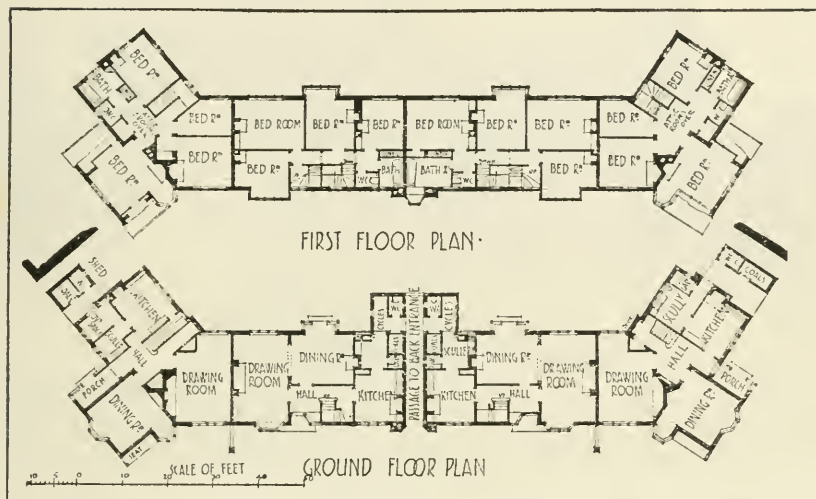


A HOUSE ON NORTON WAY

Some Typical Garden City Houses

(15)

FOUR HOUSES, SOUTH VIEW

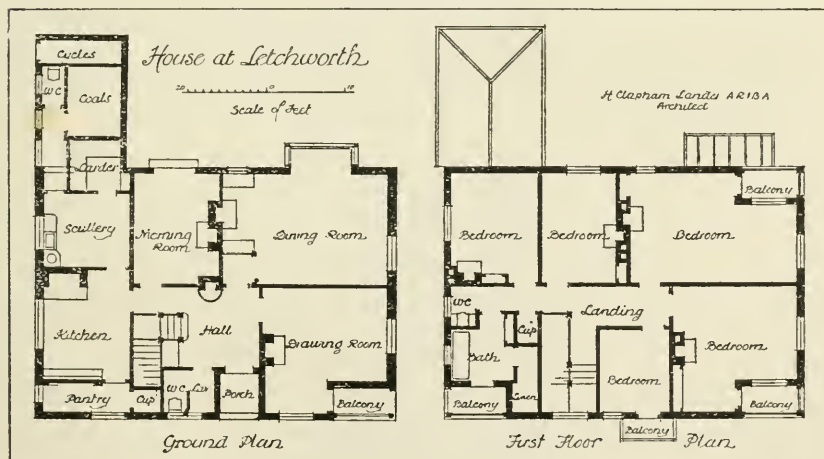


C. M. Crickmer, F.R.I.B.A.

Letchworth

(16)

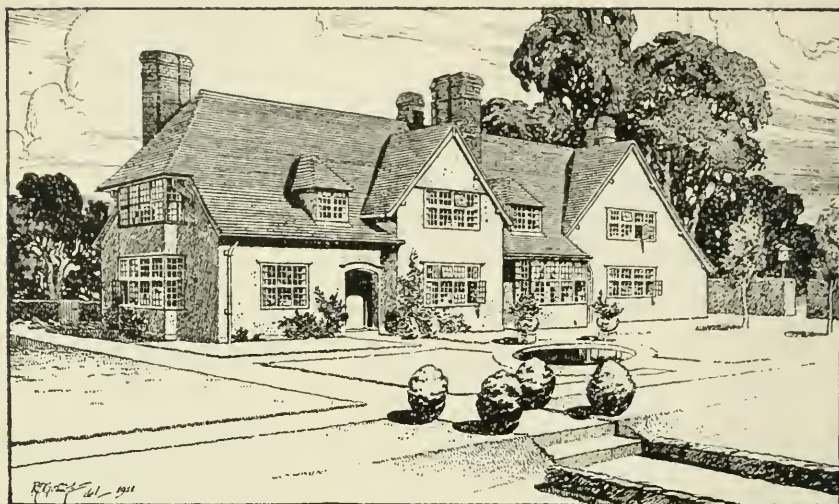
A HOUSE ON NORTON WAY



H. Clapham Lander, A.R.I.B.A.

Letchworth

The Garden City



A House on Letchworth Lane. (From a Drawing by R. P. Gossop.)

VII

It would hardly be possible to find a better ending for this chapter, in which we have described so many excellent houses, than the little poem in the *Noble Numbers* of Robert Herrick, in which he utters "A Thanksgiving to God for his House."

"Lord, Thou hast given me a cell
Wherein to dwell ;
A little house, whose humble roof
Is weather proof ;
Under the spars of which I lie
Both soft and dry ;
Where Thou my chamber for to ward
Hast set a guard
Of harmless thoughts, to watch and keep
Me, while I sleep.
Low is my porch, as is my fate,
Both void of state ;
And yet the threshold of my door
Is worn by th' poor,
Who thither come, and freely get
Good words or meat ;

Some Typical Garden City Houses

Like as my parlour, so my hall
And kitchen's small ;
A little buttry, and therein
A little bin
Which keeps my little loaf of bread
Unclipt, unflead.
Some brittle sticks of thorn or briar
Make me a fire,
Close by whose living coal I sit
And glow like it.
Lord, I confess, too, when I dine,
The pulse is Thine,
And all those other bits, that be
There placed by Thee ;
The worts, the purslain, and the mess
Of water-cress,
Which of Thy kindness Thou hast sent ;
And my content
Makes those, and my beloved beet,
To be more sweet.
'Tis Thou that crown'st my glittering hearth
With guiltless mirth ;
And giv'st me wassail bowls to drink,
Spiced to the brink.
Lord, 'tis Thy plenty-dropping hand
That soils my land ;
And giv'st me for my bushel sown,
Twice ten for one.
Thou mak'st my teeming hen to lay
Her egg each day ;
Besides my healthful ewes to bear
Me twins each year,
The while the conduits of my kine
Run cream for wine.
All these, and better Thou dost send
Me, to this end,
That I should render, for my part,
A thankful heart ;
Which, fired with incense, I resign
As wholly Thine ;
But the acceptance, that must be,
My Christ, by Thee."

CHAPTER VI

CO-OPERATIVE HOUSEKEEPING IN GARDEN CITY

"The fairly prosperous Utopian belongs, in most cases, to one or two residential clubs of congenial men and women. These clubs usually possess in addition to furnished bedrooms more or less elaborate suites of apartments, and if a man prefers it one of these latter can be taken and furnished according to his personal taste. A pleasant boudoir, a private library and study, a private garden plot, are among the commonest of such luxuries. . . . There are sometimes little cooking corners in these flats—as one would call them on earth—but the ordinary Utopian would no more think of a special private kitchen for his dinners than he would think of a private flour mill or dairy farm."—H. G. WELLS, *A Modern Utopia*.

I

ANY proposal directed towards the simplifying of the home is welcome in our day. It is not domestic servants only who are dissatisfied with existing arrangements, and are on the point of rebellion against them, it is the housewives as well. Wherever women talk together there are evidences of discontent, the result of failure to make the home run smoothly and fulfil its functions. It is not, as some say, that women are beginning to rebel against the home as against their ancient prison. It is simply that the unscientific drudgery of housekeeping and of maintaining the out-of-date house is becoming more and more apparent and intolerable. "It is not too much to say," said a writer in one of the newspapers recently, "that there are hundreds of women who are being overworked into premature old age and bad health by needless, futile housework." The ideals of Victorian society about home, the family, and women are as dead as all the other ideals of that time. But the houses remain, and the methods of running them, and the relations between mistress and maid. Everything has changed except the houses we live in, the food we eat, the manner of its preparation, and the attitude of the ordinary woman to her servants. The result of these survivals of the near past is that we are all in constant conflict with our surroundings.

Co-operative Housekeeping

The attempt to accommodate the old organisation of the home to the altered conditions of the present day is as unsatisfactory as would be an attempt to dress or do business in the style of the eighteenth century. We cannot fit the new life into old houses. We want new houses and new towns, and a new kind of domestic policy, to bring back comfort into the home.

II

The Garden City itself is a means of escape from the old houses in the old towns. Here we find houses suitable for the times ; modern in design and equipment ; imperfect in their results, it is true, but always getting nearer to perfection ; at any rate, conceived afresh and aimed at satisfying the requirements of those who are to live in them. But the new houses, and the new town even, are not sufficient. We want a new system of domestic service. The new houses reduce labour to a large extent ; the mistress is often able to dispense with a maid, which in a small house is a very great gain. But the need for new kinds of arrangements for domestic help and for reducing the friction of the home is imperative. An attempt to meet that need has been made by the man to whom Garden City itself owes its existence. Four years ago Mr. Ebenezer Howard started a scheme designed to overcome the difficulty of the domestic servant by building a group of flats and cottages around a common dining-hall and in conjunction with an organised system of domestic service on which the occupiers of the flats and cottages could draw. These flats are so arranged as to secure, in the words of the prospectus, " the fullest privacy of individual and home life," while at the same time principles of co-operation are applied to certain problems of housekeeping. Thirty-two houses are planned so as to form three sides of a quadrangle and part of a fourth, with the administrative buildings in the centre. These central buildings comprise a dining-hall, tea-room, reading-room, smoking-room, garage, etc., with the kitchen and accommodation for the domestic staff. Meals are served in the dining-hall, or in the tenants' own houses. The houses are heated by hot water from a central source ;

The Garden City

cleaning of boots and windows is undertaken, and further domestic help at fixed rates of payment can be obtained by the tenants according to their requirements. Each house or flat is connected by private telephone with the central office, and each house has a separate garden.

The houses are of three types :

TYPE B.—*Flat* : Sitting-room (16 ft. by 12 ft.), bedroom (12 ft. by 10 ft.), bathroom and W.C., pantry with sink and small gas stove.

TYPE C.—*Flat or House* : Sitting-room (16 ft. by 12 ft.), pantry, bathroom, etc., as above, and two bedrooms (13 ft. by 12 ft.).

TYPE D.—*House* : Sitting-room (19 ft. by 12 ft.), with pantry, bathroom, etc., as above, and three bedrooms.

Type A was to consist of a bed-sitting-room and pantry, the bathroom to be shared by two tenants, but none of these smaller flats have been built.

The rents and charges, inclusive of rates, taxes, and water, heating, maintenance of general garden, window cleaning, etc., use of common rooms and salaries of administrative staff, etc., are :

	Rent	Charges	Total
Type B	£28	£12	£40
„ C (if a flat)	38	14	52
„ C (if a house)	40	14	54
„ D	48	16	64

It has been possible to make the charges for meals very light as salaries and rent were already provided for, the receipts from the catering department having to cover simply the cost of food and fuel, the lighting of dining-room, other common rooms, the kitchen and rooms of staff, together with the depreciation of furniture and utensils, and food and laundry for the staff.

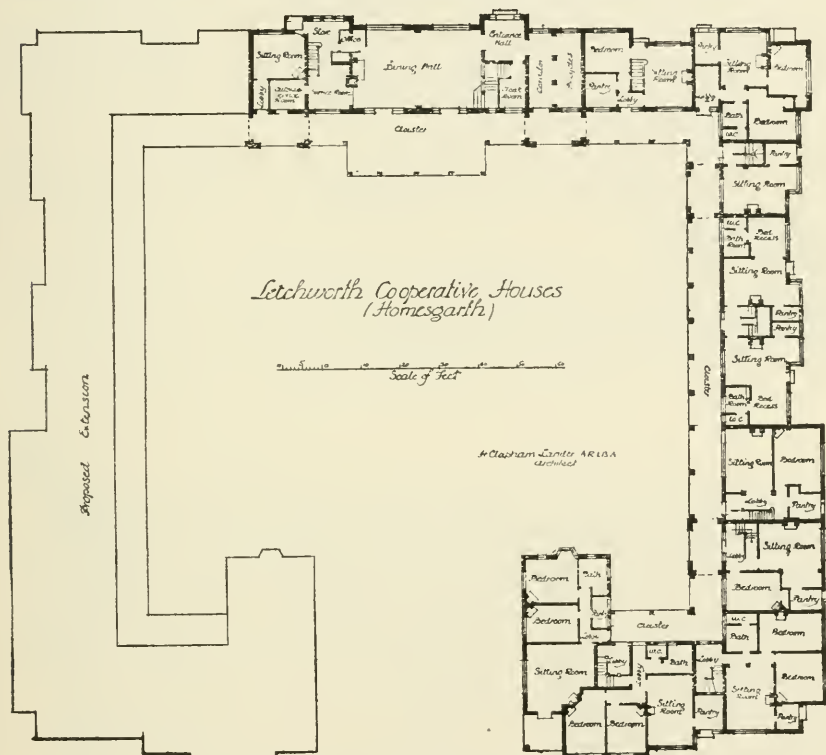
The adjustment of the general charges so as to make them fall fairly on those tenants who attempt to economise as well as on others who do not is one of the problems of the undertaking. If all the charges of the establishment, including those already mentioned as being contained in the price of meals, were added to the rental of each respective flat, leaving only the cost of the food and its preparation to be met in the catering department, then flats with several occupants, and tenants taking all the meals, would secure advantages over tenants living alone or with a companion, and



HOMESGARTH : IN THE QUADRANGLE

Co-operative Housekeeping

economising on meals. On the other hand, if, as in ordinary restaurants, those charges were covered by the prices in the dining-room tariff, then economical persons would benefit at the expense of others, and there would not be so great an inducement to use the full



The Ground Plan of the Co-operative Houses.

advantages of the place. It is necessary that the dining-room should be used as much as possible, if the scheme is to be properly carried out, and for that reason the charges for meals must be kept low. As a means of escape from the dilemma it will probably be found possible to apportion the expenses partly on the dining-room tariff and partly on the separate flats according to the basis of the number of occupants in each.

The Garden City

III

The particular economies of this co-operative housing scheme are said to be :

- (1) Saving in respect of wages and maintenance of, and accommodation for, domestic servants.
- (2) Saving in kitchen space.
- (3) Reduction of work in cleaning and dusting.
- (4) Reduction in cost of commodities purchased at wholesale prices.

The project commends itself to the mistress, because she is spared the necessity of engaging private domestic service, and escapes the anxiety and expense which this involves. She is also relieved from the frequent calls of tradesmen soliciting orders, as the daily task of planning and preparing meals is the business of the management. A greater variety of food is obtainable, the labour involved in housekeeping is reduced to a minimum, the dirt and trouble incidental to the use of open fires is largely avoided, and time is saved for other occupations.

There are also benefits to the maid, inasmuch as it gives her greater freedom, defines the nature of her work and her hours, and enables her to associate with others of her own age and calling. Domestic service under these conditions assumes a new interest, and appeals to a better class of girl.

IV

“Homesgarth,” which is the name of the co-operative buildings, deals with the kitchen and abolishes it from the private house. The other economies it effects are all due to that one thing. The labour of the kitchen being removed, the friction of the house is reduced and all its arrangements are simplified. More than half the energy of the ordinary home is exhausted in the kitchen ; with that energy set free to be devoted to all the elements of the home



HOMESGARTH : THE DINING ROOM



HOMESGARTH : A PRIVATE SITTING ROOM

Co-operative Housekeeping

which are not concerned with food it is clear that comfort and convenience are increased. The scheme does not, of course, offer a way of life to suit everybody ; if it did that, or attempted to do it, it would probably very quickly fail. But it certainly provides a way of escape for those who wish to lighten for themselves the burden of housework, and especially for those who dislike the kitchen.

V

The success of such an undertaking depends largely upon its management, which must be efficient and unobtrusive. It is not a hotel or a club, though many of the qualities of the club will attach to it, and the people will require to be, in some degree, of a clubable sort.

For the complete development of the opportunities provided by the scheme, the tenants need to possess and to cultivate a friendly spirit, and the common rooms should be a centre of common life and pleasant social intercourse. But it is essentially a group of separate homes, and the preservation of the privacy of each of those homes is the very first need. To secure this combination of absolute privacy and of the benefits of co-operation and communal action in certain things is the chief object of the management ; so the rules and internal organisation of the scheme are directed to that end. The personality of the management is, therefore, a very great factor in the success of the undertaking. The working of the scheme is as yet in its early stages, and it is too early to pass any judgment upon it. So far, it will be admitted, it has overcome most of its peculiar difficulties and offers promise of interesting developments.

CHAPTER VII

GARDEN CITY GARDENS

“ They set great store by their gardeins.”—SIR THOMAS MORE, *Utopia*.

I

A GARDEN is good for many purposes. It is good for exercise, for sleeping in, for lovers, for children, for cats, for the spending of money, and, what is the same thing, for gardening. It is good for bragging over, for writing songs upon, and for making a chapter of a book. It is good for meeting almost every need a man may have ; and, were this an essay on gardens, written in praise of them, then it would be possible to add many more and greater benefits than those already enumerated, though it would hardly be possible to say anything not already said by many more excellent writers. Our aim, however, is much more simple : it is to give the reader of this book, anxious to hear about the gardens of our Garden City, an assurance that in respect of them the town is true to its name.

II

The gardens of the Garden City are not the great public places of which the big towns boast, but the small individual gardens of its houses and cottages. There are no public gardens in the town, and of its open spaces something will be said later. These private gardens are in a very special sense characteristic. They are of it, and reflect its spirit, more directly perhaps than its architecture. And this, not because of their magnificence, or their rare quality, but because they are so many and varied and such special emphasis is laid upon them in the very name and structure of the town. The garden is inevitable in Garden City. There is no escape from it. You may go to other towns and find houses of all kinds

Garden City Gardens

with no gardens at all. You will not find a house in Garden City without one—a real practical garden, not a mere back-yard. They would not let you build a house here unless you would take sufficient garden, according to the size of the house, and unless you agreed to keep it in order. “The garden attached to every house shall be dug over, laid out, and planted,” says the building regulation, and the lease binds the tenant to keep it “in proper and neat order and condition.”

III

This does not mean that every man who has a house in Garden City and lives there is a good gardener, or any sort of gardener. There are those who hate the sight of a spade or hoe. There are many who detest seeds and soils and the labour and backache. They will then employ a gardener, or let the weeds rule until neighbours protest. Happily, the majority keep their gardens well. You may accept it as a good rule that where men have gardens they will keep them in order when they love their homes. However much they may dislike the actual fatigue of digging and watering, mere self-respect will cause them to see that their gardens are maintained. A garden is irresistible to the man of wholesome mind. He cannot suffer it to fall into neglect. Without working it himself he will at least set another to do it for him by proxy; and when the work is done, and the borders are full of bloom and the grass is like a carpet, he will enjoy it as though he had sown and planted there himself.

The pride that people have in their towns and in the houses which give them shelter is shown in their gardens. When they have order and richness then you may be sure that the civic life runs free.

IV

The complete citizen will work his own garden, depending as little as may be upon the professional. To him the sweets of its flowers are most sweet, and the “violets and pencilled hyacinths” most precious. He it is who finds with John Evelyn that “the aire

The Garden City

and genius of gardens operat upon humane spirits towards virtue and sanctitie." He it is who, after a delightful time with catalogues, followed by a busy time with seed packets, watches the days with eagerness in which "the flowers 'ginnen for to spring." For him the soft rains have a meaning, and the wind and sun and the frosts of late spring. He is near to recover all the lost arts of man which came from leisure and contact with the soil. Leisure, of which we in our day have so little, is the first need of the gardener, and if business is to be kept from stealing the whole of our time the gardener will be the bulwark to preserve it for us. While getting health for his body the gardener finds health for his soul, for prayer and meditation are the occupations to which gardening is joined. A good garden is a sign of content. It gives the note of repose. In it a man can lose his cares. How many of us have read with fellow-feeling the entry in Mr. Pooter's diary? "Arrived home tired and worried . . . planted some mustard and cress and radishes, and went to bed at nine."

To come from the train at night or from one's office or workshop in the town, having left the vexations of affairs behind, to enter one's own quiet garden where tranquillity rests upon the scent of earth and flowers, undisturbed by the last piping of birds—that is the daily refreshment of every man of Garden City. Not many men are so happy :

"Returning home at evening, with an ear
Catching the notes of Philomel . . ."

V

What joy is more complete than that to be found in the making of a garden? To get your piece of land, which before the house was built was ordinary pasture, or arable land even, and have the making of the garden from the beginning, why, that is worth a great deal. You look over it with an eye of anticipation. Here you will have your lawn, and there your paths, and to the right the herbaceous border, and on the left the place for annuals, and this corner will



A GARDEN ON CROFT LANE

Garden City Gardens

make a rockery ; and what with a rose bed, and shrubberies, and a few trees, you have a prospect so delightful that it seems the best garden that ever you saw. And then the beginning of the work, the turning over of the sods, two spits deep (never less if you are wise !), and the commencement of the long struggle with dandelions, charlock, twitch, and other weeds of evil nature. You grow potatoes for the first season, perhaps, to help you clean it, and very good potatoes you will get. Then, after much digging and planting and waiting, the garden takes the shape you desire, the lawn begins to look a little like a lawn, and the rest of it begins to be defined. And because you make the garden and not some tradesman for you, you put in it the best there is of you ; the memories of times that are gone. The plants and flowers you grow bring back childhood and holidays ; they will remind you of books, of happy days, of old friends, and their fragrance is greater because of the added sweetness.

“ Here is the ghost
Of a summer that lived for us,
Here is the promise
Of a summer to be.”

The garden as you make it is the gathering place of past years, and in it the seasons and nations meet. As the summers pass you add to it until it is full of all precious things, and with the increase of the garden your life grows in richness.

But, after all, though a garden may hold in it what belongs to the past, it is made for the future ; the little bit of arabis will spread until the original piece is lost, the tiny sapling will become a great tree. A garden makes you think of the future ; for you cannot be in it without wondering how this and that will turn out, and what wonders time will perform. It was a saying of Maurice Westerton that “ nothing could be more divine, more ethereal, more Epicurean, in the best sense of the word, than to sit in a perfect garden and read a perfect book.” To sit in a perfect garden, yes ; but not to read even the most perfect book, for, even though you have such a book with you, you will sit and let thought glide on to those happy and delightful places beyond experience and untouched by time where the things of the future flourish.

The Garden City

VI

“The soile,” we read in an old book, “is rich, plentious, and delightful,” or, as John Norden said in the eighteenth century, “in the North part of the Shire, as in the hundreds of *Hitche*, and *Oddesey*, the soile is very apt to yield corne, and dertie wayes.” The soil of the Garden City is, indeed, very apt to yield all that the gardener requires. It is, for the most part, clay over chalk, and, although until the Garden City came to be built upon it, it was used for little but agricultural purposes, it is stuff out of which excellent gardens can be made. For roses the place is so well suited that the neighbourhood is famous for them, and the rose gardens are many. The old orchards show how good it is for fruit of all kinds. It needs good working and the right manure, but it repays all that is put into it. As a garden is not merely for ornament, but for use, the vegetable garden is not despised. Every house has its little bit of kitchen garden in which at least the choicest vegetables are grown. Peas, for instance, are never half so sweet as when they come straight from your own garden, and the same is true of many another vegetable. The workman’s garden is given over almost entirely to the cultivation of useful things, and while the taste for the soil comes but slowly back to townsmen, it is satisfactory to know that most of the men in the factories spend much of their leisure in regaining it.

VII

Most of the residences are detached, with gardens all round them. Thus privacy can be secured—privacy, which is most precious in gardens, and without which they lose most of their charm. An idea has been expressed at times that gardens should be open and unfenced; while there is something, though not much, to be said for such treatment of front gardens, there is nothing at all to be said for it, and very much against it, when the garden proper is meant. A garden that is not fenced and hidden from curious eyes



IN A GARDEN CITY GARDEN

Garden City Gardens

is no garden at all. A wall or fence is needed for shelter against the wind, if for no other reason, and the gardening uses of it are many. In a new town like the Garden City the endeavour to secure privacy depends upon time. When gardens are large they are all the more difficult to enclose. But enclosed they must be and will be. So far as the front garden is concerned, the problem in the Garden City is more difficult than it is elsewhere. The houses are so far apart that for the sake of unity the gardens demand one general treatment. High close fences are, very properly, not allowed, for it is essential that the aspects of the gardens to the streets should possess some qualities of cheerfulness and beauty. In many instances the front hedge is of climbing roses, making in the early summer gay avenues for the passer-by. You will not find the dull brick walls and dreadful wooden fences of the old towns. If there be a hedge, hiding the house from the road, it will be a living hedge.

VIII

There is a garden on the edge of the town in which the man who owns it spends all his holidays, finding that they yield him most joy when he spends them so. He is a man no longer young, who has seen the countries of the world, and the wisdom he has gained teaches him that there is no more excellent thing than "turning to one spot on earth and calling it our home."

When other men are by the sea or on the mountains he puts on his old jacket and lets the morning and evening find him among his plants and fruits. He tends his flowers and the little vegetable garden, and as the summer goes by he picks his own fruit and boils his jam on a fire in the open air. At night he makes a bed in his little summer house amid the trees, and sleeps as sweet as a child. If you are fortunate you will get a note in the autumn inviting you to gather crab apples from his hedge, and you will go, putting off other engagements, and have with him one of the best days of your year. The treasure of his garden is an old chalk pit, disused so long that it is now full of hawthorn and wild roses and a hundred lovely plants, the sowing of nature. It is an exquisite surprise to

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come upon this wild spot in a town garden, so great a surprise that you forget to be envious. For this is a very true thing, that while a garden is the work of man, yet nature alone can set the seal of beauty upon it, and all the efforts of the energetic and all the money of the rich will not make a perfect garden until Pan has played upon his pipes there. But when you get an old piece of tangled woodland, however tiny, like this old chalk pit, then, so long as you do not ruthlessly improve it, you have a home for the garden god ; and he will make the flowers spring and set their fragrance, in Bacon's quaint phrase, coming and going in the air " like the warbling of music ; " all sorts of delicate things will flourish and the atmosphere that surrounds your home will be charged with strange delights. The owner of this garden values everything in it and loves everything in it, and would not exchange his quiet life there for all the excitement and profits of the uneasy world. He is serene and content, and you will see in him the sort of man spoken of by Emerson (one of his favourite writers) when he said, " He who knows the most, he who knows what secrets and what virtues are in the ground, the waters, the plants, the heavens, and how to come at these enchantments, is the rich and royal man."

IX

There is another garden, not in the Garden City, though you will find companions to it there ; but, because it is so much like what we would desire our gardens to be, the account of it is given here, for there is no danger of it making this chapter too long. It is from Virgil, in the *Georgics*, and reads thus : " Beneath the lofty battlements of Tarentum, where black Galæsus waters golden corn fields, there I mind me I once saw an old swain of Corycus, the possessor of a few acres of waste land. His estate was poor soil, no grazing for cattle or for sheep, nor apt for vine-growing. Yet here amid the brambles he would set a patch of garden stuff here and there, bordering it with white lilies and vervain and meagre poppies, and in his contentment he rivalled the splendour of kings. In the dusk of the evening turning his footsteps homeward, he would

Garden City Gardens

load his board with unbought dainties. Spring's first rose, autumn's first apple he would pluck ; and when surly winter was still cleaving the rocks with frost and checking with icy curb the gallop of the waters, my gardener was already cutting the blooms of hyacinth from their lush stems, chiding summer's late return and laggard westerly winds. So he was the first, too, with his brood of bees, and the riches of many a swarm, and first to squeeze into the bowl his honey frothing from the comb. Lime-trees he had, and luxuriant pines, and every bud that his fruitful tree arrayed itself withal at the blossoming time in spring it carried ripe in autumn. Nay, more, he could transplant into rows full grown elms, the hardy pear, and sloe stocks already bearing plums, and the plane already offering shade to his cronies over their wine."

X

In the Garden City we have a community of gardeners. However various our occupations and tastes, however conflicting our opinions, in the garden we are united. There we find a common interest and a ground of neighbourliness. There we have the same enemies, and join in one battle, and aim after a single perfection. A community brought together by such means, and taught the virtues of patience and resourcefulness which come from the cultivation of nature, will, in the development of its social consciousness, acquire the strong qualities of mind and body which will fit it to undertake experiment and adventure, without which our common life becomes stagnant. The occupations of the garden provide excellent training for the world and the government of affairs. They add to dignity and self-confidence, and cause men to think well of themselves. A gardener has the caution that reformers lack, and at the same time he is always prepared to take necessary risks. He knows that while great things come from small beginnings, a goodly tree does not spring up in one night ; that what quickly grows as quickly perishes. He knows how complex and variable is nature and how utterly we are in her hands. He will know, if others forget it, that the building of a Garden City will not be the work of a day.

CHAPTER VIII

THE OPEN SPACES AND RURAL BELT OF GARDEN CITY

" I leave this notice on my door
For each accustomed visitor :
' I am gone into the fields
To take what this sweet hour yields.' "

SHELLEY.

I

ALTHOUGH an open space in a city has come to mean anything, even a disused churchyard, so that it is a term which has lost its pleasant sound, when we come to it afresh, free from its associations with city problems, it brings us a touch of the fine and exhilarating qualities which belong to it of right. An open space should, in the very sound of it, make us breathe more deeply and arouse in us the desire to stretch our limbs. It should give us at least the idea of space, and should set us free from the restrictions of the town. An open space should be a means of retreat from the town, a sanctuary to which the townsman can fly when the pressure and noise of life are too insistent. We get something of this feeling in the great London parks and commons; we get it rarely in any other town. Elsewhere, the town is so much with us that wherever we may go in it we cannot shake its presence off; nature is as conscious of this as we, and suffers as much from the constant burden of it.

II

In the Garden City the characteristics of the open space belong to the town as a whole. When you walk about the town for the first time what you notice most is the spaciousness of the streets and the great width of the sky. The roadways are, if anything, rather narrower than in other towns, but the trees and greenswards



ON NORTON COMMON

Open Spaces and Rural Belt

and the distance between the houses make of the streets a continuous open space, to which occasional shrubberies and beds of flowers give additional variety. Each street has a slightly different character, so that you may walk the whole round of the town and think yourself to be in a garden all the while. In every part of it you can hear, if you cannot see, the unmistakable signs of the open country. In the very heart of the town the pleasant noises of the farm are heard, and as the worker in the town's industries follows his vocation, around him the lark "drops his silver chain of sound." There is no need of formal public gardens where this experience is shared by all. When the edge of the country comes up to the very walls of the factory, there is no need to set aside a piece of park land for iron railings and asphalt walks. When a spacious feeling is yours the moment you step out of the railway station, and remains with you wherever you go, there is no occasion even to mention parks and open spaces, for the mere idea of them never occurs to you.

This does not mean that there are no special open spaces in Garden City. There are many, and, we may believe, there will be more. With the common, and recreation grounds, and little pieces of wild open ground everywhere, there will be, in time, when there is a need for it and when there is money to spare for it, a park in which there will be found trees of all kinds, and shrubs, and music in the evening, and who knows what variety of pleasures for the crowd. At present the absence of such a means of enjoyment is never noticed, because the country is so near and every facility for open-air pursuits is in abundance.

III

Two minutes from the station and five minutes from the Town Square is the chief open space, Norton Common. These seventy acres of woodland, so near to the centre of the town, are its most precious possession. It is a piece of old common land awarded to certain cottagers of the village of Norton at the time of the enclosure in 1798, but long lost by them and fallen into the hands of their masters. Before the Garden City Company acquired it, it was used for sporting purposes. A wild stretch of country divided by

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a little stream, rich in bird life and in wild flowers, with magnificent hawthorns and other trees, it is of inestimable value to the town. If this common were not exactly where it is, the Garden City would lack a great deal of the peculiar rural atmosphere, which no gardens, or open fields even, could bring to it. Being so close to its centre it is a part of the town, and its influence pervades it. It is like a crown of untamed nature, or, rather, like a heart of virgin sweetness which will ever keep the town pure. Its native beauty has not yet been disturbed, and we may hope that the company into whose possession it has come will have the rare wisdom to preserve it. Man did not make it what it is, and no work of his can improve it. The slightest attempt at improvement, however well meant, will involve the destruction of all that is most lovely in its original state : the innumerable little fastnesses within it for the retreat of nature, the unexpectedness of its scene, the sanctuary it provides for many birds, and its wealth of flowers. Mr. Milestone in Peacock's tale might well complain that it had not been touched "by the finger of taste ;" but it needs no "wand of enchantment" waved by such as he. As in the Garden of Adonis :

"Ne needs there Gardiner to sett or sow,
To plant or prune ; for of their owne accord
All things, as they created were, doe grow."

It is to-day an opportunity at the door of every townsman to gain that liberal culture which comes from a knowledge of natural things. There he may surrender himself to the gentle influences of the spring and find shelter from the heat of summer, and winter and autumn will have ready for him generous gifts. On every day of the year nature has there her table spread, and whoever is tired of the things men so greatly strive after will find heaped up satisfactions in her company. And with nature, sitting at her feast, a man will discover the resources of his own being and secure repossession of his soul. For "what is Nature?" says Novalis, but "an encyclopædic systematic index or plan of our soul." We go to her for self-knowledge and for the equipment of our spirits. We go to her when we are glad to rejoice in her company, we go to her when ashes are our portion to get "hertes hele and dedly woundës cure." And on this common, wonderful possession of Garden City, nature is en-



ON THE NORTON ROAD



ON THE FOOTPATH TO RADWELL

Open Spaces and Rural Belt

throned as the sovereign deity of the town. The other gods may have their worshippers ; Dionysus, Pallas Athene, and the Cytherean queen may hold a little sway ; but so long as Norton Common lasts the high God of Arcadia is supreme.

Here you may go over your lists of flowers and make music out of their names ; rest-harrow, hawkweed, celandine, cowslip, water-soldier, agrimony, meadowsweet, St. John's wort, and many hundred more. Here you will look for wonders in the stream, if you have tastes of that sort. Here you will watch for birds, of which, did we know about them, we could make a brave list. Here the cuckoo will be heard, whose note, so penetrating and weird, makes up half the strangeness and wonder of the spring. Here, also, the nightingale will make the night merry ; so merry, indeed, that sometimes in May you will find yourself sleepless for the din. But you forgive him that, as you forgive him everything. To have such a song travelling to our open windows is worth much discomfort. That song has been praised by many, from Theocritus to Chaucer, and by all poets since, but never has it been written of so well, not even in the great ode of Keats, as by Izaak Walton. " But the nightingale," says he, " another of my airy creatures, breathes such sweet loud music out of her little instrument throat, that it might make mankind to think miracles are not ceased. He that at midnight, when the very labourer sleeps securely, should hear, as I have very often, the clear airs, the sweet descants, the natural rising and falling, the doubling and redoubling of her voice, might well be lifted above earth, and say, ' Lord, what music hast Thou provided for the saints in heaven, when Thou affordest bad men such music on earth ? ' "

IV

After the common, the chief feature of the spaciousness of Garden City is its rural setting. The town is set in open fields like a jewel in its setting. Two-thirds of the entire area of the estate are kept as farms, orchards, parks, and small holdings. This rural belt surrounds the town like the walls of the mediæval city. It limits its boundaries, protects it from the attack of other towns, and

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preserves its shape and style. It also gives it finish and completeness. The ragged edges of the ordinary town, the mean and neglected aspects showing "a gradual despair on its outward course," are not found in Garden City. There, where the town finishes the country begins: the true country, with none of the unhappy depression hanging over it which comes from proximity to a large community.

In all the modern Utopias town and country are pictured as being in happy relations, in contrast to the existing state of our society, in which agriculture and industry are isolated as they were never before in history. In *News from Nowhere* it is said, "The town invaded the country; but the invaders, like the warlike invaders of early days, yielded to the influence of their surroundings, and became country people; and in their turn, as they became more numerous than the townsmen, influenced them also; so that the difference between town and country grew less and less; and it was indeed this world of the country vivified by the thought and business of town-bred folk which has produced that happy and leisurely but eager life. . . ." And in Mr. Wells's *Modern Utopia* we read, "As one walks out from the town centre one will come to that mingling of homesteads and open country which will be the common condition of all the more habitable parts of the globe."

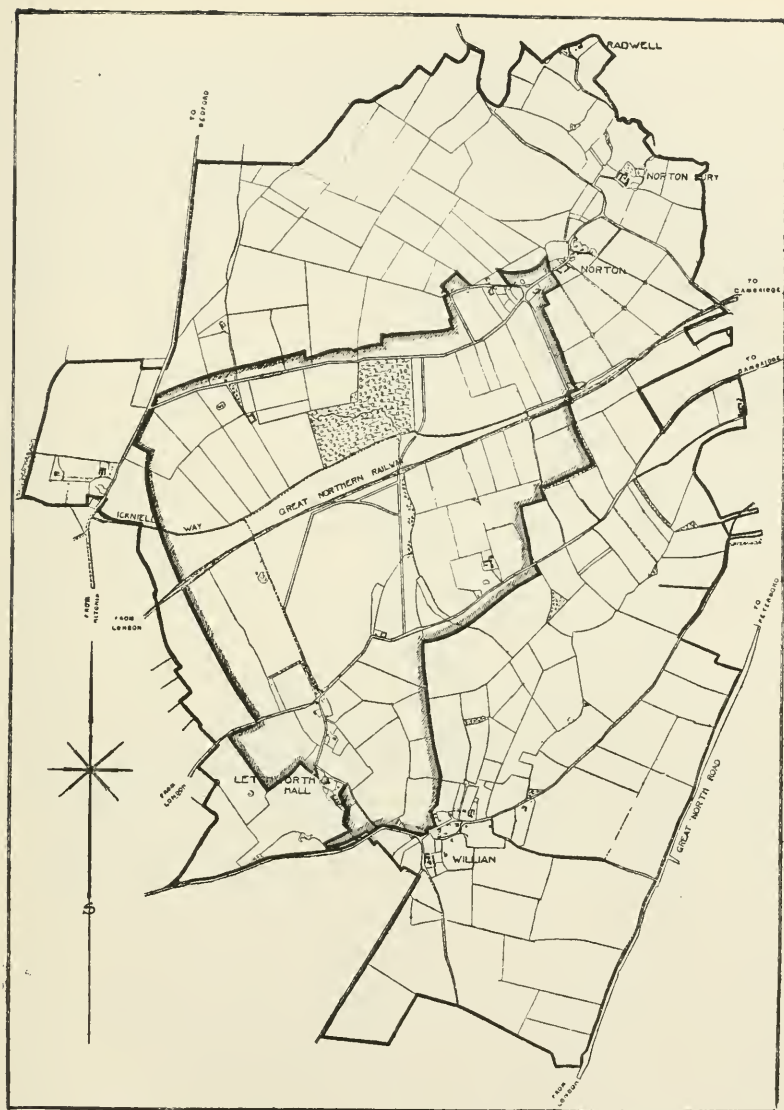
The idea of new conditions in which country life would be remade with the remaking of town life is one of the most attractive notions of these two books, and the Garden City is interesting, if for nothing else, as the first organised attempt to bring about that revolution. The cry of "Back to the land" has been raised many times, and many half-hearted efforts have been made to repeople the starved countryside, but not until the foundation of Garden City was there any promising means of bringing new life into agriculture. It was not merely to build a healthy town that the promoters of the Garden City set out, but to bring new interests and new developments to the farm. The Garden City does not, like other towns, destroy rural pursuits; it intensifies them. In the first prospectus issued by the company the directors stated that it was part of their proposal to secure: (1) "The stimulation of agriculture by bringing a market



THE MANOR FARM, NORTON



FRUIT FARM AT WILLIAN



A Plan showing how the Town Area of Garden City (shaded) is surrounded by the Rural Belt.

The Garden City

to the farmer's door"; (2) "The relief of the tedium of agricultural life by accessibility to a large town."

The rural belt is thus no mere lung. It is not pleasure land; it is in agricultural occupation. "The tillage lands of the city are not barren gravelly soils, but like the fertile plains of Asia, which produce abundant crops and fill the barns of their cultivators." The fostering of the rural life upon its land and the improvement of the status and conditions of the labourer are some of the special objects of the town. It is worthy of note that the purely rural population of the estate has already doubled, and there is no doubt that it will steadily increase.

In Garden City agriculture is once more brought into relation with other industries. There is no attempt to revive domestic industry, but in the encouragement of the most advanced and efficient methods of manufacturing and factory administration on the one hand, and by the stimulus to the best kind of farming on the other, results suited to modern conditions will be obtained. Garden City provides an opportunity for men to work a small piece of land in conjunction with other occupations; it is likely that there will be considerable developments in that direction in the future. It is thus that the divorce between agriculture and manufacturing, which was the work of the nineteenth century, will be undone by the Garden City in the twentieth. "History," says Mr. J. A. Hobson, "provides us with no example of a nation of town-dwellers divorced from life and work upon the soil which has long maintained itself in safety and prosperity."

V

The open streets, the common, and the rural belt give to Garden City to-day, and will preserve to it for all time, healthy country qualities, and the sight of corn-fields and pasture lands which men shut up in large cities have lost and forgotten. The invitation of the open road, of the little path across the fields, is always there for those who live in the new town. They may take one or the other, and wander over the countryside gathering experiences that cannot



THE RURAL BELT AT WILLIAM

Open Spaces and Rural Belt

be found in smoke-laden streets. They will come across streams and woods and quaint villages, and the records in old churches of times that are gone. The heights of the Chilterns are within their reach, and Jack's Hill with its legends is but the flight of an arrow ; while the Icknield Way, on which Boadicea and the Icini rode from battle, will take them for many miles to the east or west. They are brought back to England, to the soft landscape of their country, the love of which hidden in the heart is the root of all patriotism. England is not to be found in the huge towns, and the pure love of it declines amid the excitements of great crowds. It is in little communities of men, living and working in little towns, surrounded by the sweet influences of nature, that pride in their homes and affection for their native land arise, so that men dare all things and do all things for their country's sake.

CHAPTER IX

CHURCHES AND INNS

“ FALSTAFF : An I have not forgotten what the inside of a church is made of, I am a peppercorn.”—*The First Part of King Henry IV.*

I

IN the churches and inns of Garden City the old traditions of English social life survive in the modern town, and it is because they are always the last defences of the old against the attack of the new spirit that it seems fitting to treat of them together. Wherever the remnants of the old life of our fathers remain you will find the church and the inn combining to preserve them, and wherever decay has fallen upon towns and villages they are the last to disappear. When that decay does fall, as sooner or later it does on all old and precious things, the inn succumbs before the church, its deep foundations being less deep than those provided by religion ; and the church remains, solitary and suffering, its life slowly ebbing away. In modern England there is no fellowship between the church and the tavern. And, somehow, our religion has become vague and misty as the inn has degenerated into the public-house, though there are signs, the Lord be praised ! that that nineteenth-century horror, that flaunting, painted, and gilded abomination, is weakening its hold and coming to its end. In the Garden City there is no public-house ; but before we say something of the inns which remain it is necessary first to mention the churches.

II

The three new churches are but mission churches intended as adjuncts to the church buildings proper, when the growth of the town makes the larger buildings necessary. They are, therefore, of less interest than the complete churches which are to follow them will doubtless be, and they do not demand any lengthy consideration.

Churches and Inns


The first of them, the Free Church, in Norton Way, was erected in 1905 by Nonconformists who sought to create a fellowship of all Free Churchmen in an undenominational communion. Their efforts have been so far successful that, while the bodies of Methodists hold their own services and are about to build churches, and the Society of Friends have their own meeting-place, the other non-conformist churches have not stepped in, but, without supporting it officially, have been satisfied that the church supplies the needs of their people. The original building was constructed largely by the voluntary labour of its first supporters; although the church has been several times enlarged, the main part of it is still a testimony to that early enthusiasm. A large church building is to be erected shortly on an adjacent site.

St. Michael and All Angels' Church, Norton Way, is a small basilica type of building. It is built of red brick and covered with green slates; it consists of nave, with aisles as passages only, chancel, and baptistery. The chief architectural feature is the nave arcades of plain soffit arches on each side, rising from a cushion capital, the capital supported by twin shafts with a slight entasis. The walls internally, which are of pointed brickwork, are coloured white, giving a feeling of restfulness to the building. The roof is a wooden barrel-roof, stained dark. The church is lighted by a large west window and by alternately large and small windows on the north and south walls. The altar is placed under a lofty canopy of tapestry, the focus point of the building. Over the altar is a painting of the Blessed Virgin and the Holy Child by Miss Emily Ford. There are two other paintings by the same artist of St. Michael and St. Gabriel. The font is of brass, a Dutch design of the eighteenth century. The church is a good example of what a town mission church should be, and its non-Gothic character harmonises very well with Garden City buildings. The architects were Mr. E. H. Heazell and Mr. C. M. Crickmer. The permanent building will be on the Town Square.

The Catholic church of St. Hugh, in Pixmore Way, was designed by Mr. Charles H. Spooner, F.R.I.B.A., and although it is a small building of extreme simplicity, it is one of the most interesting Garden City buildings from an artistic point of view.

The Garden City

The problem its builders had to face was how to make a cheap church good, and by the observance of a few simple principles, by the rejection of ornament, by insisting upon all the necessary furniture being well designed and made, and by being content to wait for anything they could not afford until they could get something really good, they have succeeded in getting a building which must appeal to every one interested in good modern work. In accepting the limitations imposed upon them by the smallness of their funds, and in having at the same time the courage to employ an artist of perfect taste for the execution of every bit of their work, they have taught a lesson to Garden City which should be taken well to heart.

The church is an oblong hall, with merely one step raised for the sanctuary. It is built of red brick and tiled. It would be absurd in so plain a building to speak of any recognised style, but the church and its contents are more inspired by early Christian or Byzantine models than by anything else. It has an open timber roof in a pointed arch, painted green and picked out in its mouldings in a chequer of black and white, with a little red. This black and white chequer goes through all the decoration and is continued in the vestments. All round the church under the roof is a frieze with a Latin inscription in fine Roman uncials, based on those of the Trajan column at Rome. This was written by Bernard Snell. The text is taken from Solomon's prayer at the dedication of the Temple (2 Chron. vi. 6). The size and shape of the altar have been carefully thought out from the point of view of convenience, of the dignity of the ceremonies, and of dignity of appearance in the church. It is eight feet long. The sanctuary is hung with Morris tapestry in dull brick red and toned white. The permanent hangings have been made to look well with all five liturgical colours (white, red, green, purple, black), which are used on different days for the frontal of the altar and tabernacle-veil. The sanctuary carpet is also Morris, the same dull red, and white flowers. The altar is of oak, with a large  monogram carved on the front. This is never seen, except on Good Friday, when the altar is bare; but it is repeated in white on the purple frontal. The little pulpit-desk, credence-table, and communion-rails are from Mr. Spooner's designs, plain and rather massive, in very solid oak. Over the altar is a great *ciborium*.

Churches and Inns

This is of oak covered with black and white gesso in a beautiful pattern of vine. Along the top is a Latin inscription : " Blessed are they who are called to the wedding-feast of the Lamb " (Rev. xix. 9). The *ciborium* is vaulted inside and gilt heavily with rough gold, which sparkles in the light of the altar candles. The altar candlesticks are from a Byzantine model ; the altar cross, also a Greek type, modelled by Mrs. Spooner, is particularly fine. A beautiful statue of the Blessed Virgin, made by Mrs. Stabler, a model of which was exhibited at the last Arts and Crafts Exhibition at the Grosvenor Galleries, has been recently added. It is of plaster, coloured very moderately in grey-blue and such rather subdued colours. The ornament which is to be the most conspicuous and to dominate the whole church is now being made. This is a large cross, to hang high up in front of the sanctuary. It is painted with a figure of Christ fully robed, like a king, in white and gold, against a scarlet background. This will be the central ornament of the whole scheme—Christ reigning from the cross. All the other colours are kept low to make this gleam like a jewel. All the vestments, altar frontals, etc., are designed either by Mr. Spooner or the priest in charge, Dr. Adrian Fortescue, and have the same character. They are full of suggestions of early Christian or Byzantine ideas, sober, but with much symbolism. One symbol especially is used as a kind of badge for the church. It is the four groups of letters IC XC NI KA around a cross. This is a very old Christian symbol, meaning (in Greek) " Jesus Christ conquers."

The present church is, and the future one will be, dedicated to St. Hugh of Lincoln (1186-1200), because Letchworth was in his diocese. The future church, land for which has been secured adjoining the existing building on the Town Square, will, it is proposed, carry out the principles of the present one on a larger and grander scale. It will be a very large and high building, like a basilica, with a long nave and rows of columns and round arches : probably no transepts. It will depend for its effect much more on size and height and space than on added ornament. It will be bare and austere, with one gorgeous patch of colour in the chapel of the Blessed Sacrament. It will have an apse and plenty of room in the sanctuary, and one great, rather bare, high altar.

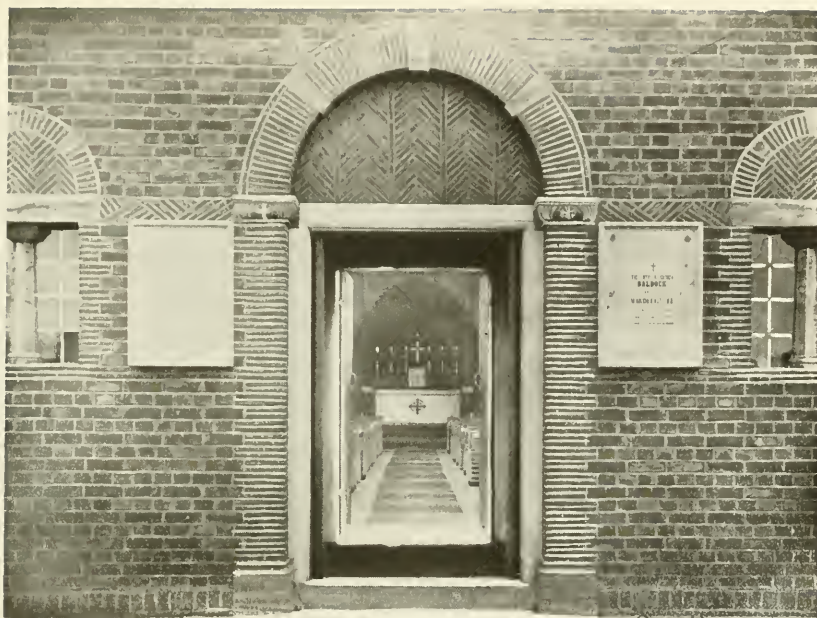
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The church was blessed (not consecrated, because it is only a temporary building) on Sunday, September 6, 1908. The auxiliary bishop of the diocese blessed it; the first (High) Mass was sung by the priest in charge immediately afterwards; then an Arab Archimandrite sang the holy Liturgy according to his rite (Byzantine).

The Catholic community in Garden City is, at present, very small, and it may be a long time before the permanent church is built, but until that day comes this little building is not without its significance as a means of instructing, not church designers only, but builders and architects of every kind of building in the use of fitting material, choice decoration, and what a very little money can be made to do by men of real artistic instinct. To Dr. Fortescue and Mr. Spooner the credit of these excellent results is due; they have worked together in complete agreement, aiming at one end, and there is nobody to whom the future of Garden City is of some concern who will not be glad to see the place enriched by their future building.

III

The old churches are on the outskirts of the town on the south and north-east. They all belong to the twelfth century, when the Normans changed the face of England, and are on the sites of ancient churches of the Saxon communities. They are built of flint rubble, the common material for all buildings of the time. Letchworth Church, the smallest of the three, has apparently not been enlarged, though the chancel was rebuilt in the thirteenth century, and the porch was added in the fifteenth. Its entire length is 51 ft., the actual measurements being—chancel, 19 ft. by 14 ft.; nave, 32 ft. by 16½ ft. It is an interesting example of our old parish churches in their simplest form, and until the Garden City was founded it provided ample accommodation for the villagers; for the population had not increased since the Conquest. The building was probably erected either by the Gernons, to whom the manor was given by William, or by the monks of St. Albans; for Chauncy, the historian of Hertfordshire (1700), says that William de Montfichet (other-



THE CHURCH OF ST. HUGH IN PIXMORE WAY



THE CHURCH OF ST. MICHAEL AND ALL ANGELS, NORTON WAY



THE FREE CHURCH, NORTON WAY

Churches and Inns

wise Gernon), " with Rohais his wife, and William their Son, in the Reign of King Henry I., gave this Church of Leechworth, with all its appurtenances and twelve Acres of land in this Vill to the Monastery of St. Alban." The monks were patrons of the church until the dissolution. Among its interesting features is the little bell turret, or cot, at the west end, supported by a four-centred wooden arch, constructed in the sixteenth century; the bell dates from the fourteenth century. There are two brasses and some mediæval painted glass; also a small effigy in chain-mail and long surcoat, holding a heart in its hands, probably of the late thirteenth century, and thought to denote heart-burial. Some of the fifteenth-century seats remain.

The Church of St. Nicholas, Norton, was enlarged in the fifteenth and nineteenth centuries; the nave is said to be part of the original building dedicated at the beginning of the twelfth century. Norton has an interesting history going back to the eighth century, and of the three villages which compose the Garden City it has seen the greatest changes. In the eighteenth century it seems to have gone to sleep, and did not waken until the Garden City brought it back into the current of modern life. The manor was given by Offa, King of Mercia, to St. Albans, in 790, but it was, later, " seized by ' wicked men ' and had come into the hands of Leofsig, the ealdorman who was banished in 1002 for the murder of the King's high steward, Aefic."¹ It was then repurchased and given to the monastery of St. Albans, which held it until the dissolution. At that time it was rented to John Bowles, of Wallington, and in 1542 it was granted to Sir Richard Williams, the great-great-grandfather of Cromwell (otherwise Williams). It is said that in the thirteenth century the church and manor were appropriated by the monks—the rector resigning his living—in order that the funds might be used for the improvement of their ale.² Thomas Longley, who became vicar in 1578, was one of those clergymen in 1586 who were, by the examiner appointed by the Archdeacon of St. Albans, " found to be ignorant in the Latin tongue, and not able to decline a noun substantive, or to discern the parts of speech. And, further, to be

¹ *Victoria County History of Hertfordshire*, vol. ii. p. 361.

² Urwick, *Nonconformity in Hertfordshire*, p. 40 (quotes *Gesta Abbatum S. Abani*, ed. Riley, i. 320).

The Garden City

unable to answer unto easy questions in the grounds of faith and religion, or to allege aptly any Scripture for proof of any article of religion.”¹ Of Thomas Longpeer, who preceded him, it is recorded, “He doth not wear the apparrell, but saith he is willing and ready to wear them.”² John Pratt, who succeeded Longley, in 1589, “was an exile for Protestantism in Mary’s reign and a great friend of Fox the martyrologist. . . . He was first rector of Great St. Bartholomew, London, in 1582. He signed a request to Convocation against kneeling at the Communion, against the wearing of copes and surplices, and for the abrogation of saints’ days.”³ As vicar of Norton, he, however, enforced the observance of saints’ days, for on May 19, 1599, upon his presentment, an order of penance was sent to George Clarke, of Norton, “for appointing his servants to work in removing hay from a stack on a Tuesday in Easter week last.”⁴ In 1662 the manor was bought by William Pym, whose family held it until it was sold by them to the Garden City Company.

The church contains some fourteenth-century seating and a Jacobean pulpit with a canopy. The advowson belongs to the Bishop of St. Albans.

The Quakers, it may be interesting to note, had a meeting at Norton in 1669: “Norton, a conventicle of Quakers who goe after John Crook, in ye late times a Justice of Peace in Bedford. Now a grand seducer and disturber of ye Peace.”

Willian church was enlarged at approximately the same time as Norton. It contains the remains of a fifteenth-century rood-screen, and the stalls in the chancel have carved standard heads of about the same period. There is one brass and several monuments.

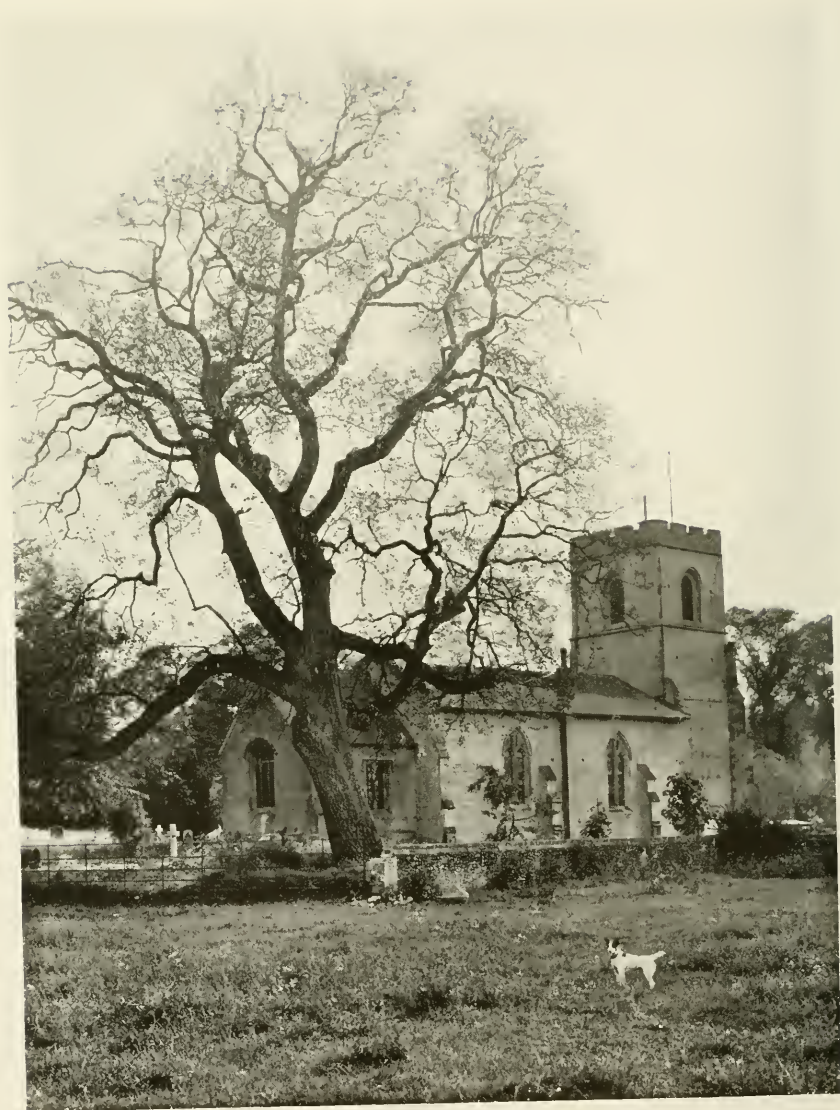
The village was three times the size of Letchworth village, and the church was correspondingly larger. In 1617, John Chapman, Fellow of Trinity College, Cambridge, who was rector, reported, “There is none in the parish of Wilyen that be of requisite age, that have not received the sacrament of the Lord’s Supper at

¹ Urwick, *Nonconformity in Hertfordshire*, p. 91 (quotes *Acta* of Archdeaconry of St. Albans).

² *Ibid.* p. 284.

³ *Ibid.* p. 281.

⁴ *Ibid.* p. 284.



THE CHURCH OF S: NICHOLAS, NORTON

Churches and Inns

Easter last.”¹ Isaac Bedford, who was rector in 1645, was one of the Puritan ministers appointed to preach in Hitchin church on market days, and was ejected as a nonconforming minister in 1660. A meeting of Protestant Dissenters in the village was registered under the Toleration Act in January 1714. About 1767 the manor became the property of the Dimsdale family, who held it for just a hundred years, selling it to C. F. Hancock, whose executors conveyed it to the Garden City Company.

IV

There were inns in Norton and Willian villages at the time of the purchase of the land by the Garden City Company, but none at Letchworth, the old Cross and Plough having been pulled down some forty years earlier. The Fox Inn, or Willian Arms, is a modern building of no particular interest, now under the control of the People's Refreshment House Association, Ltd.; it has been much improved under its new management. The Three Horse-shoes, at Norton, is also under the same control.

Letchworth Hall Hotel is not properly an inn, being the old manor house converted by the Garden City Company into an hotel. It is, however, one of the most interesting and delightful buildings in the town. The present building dates from the seventeenth century, and to it and its site all the early history of Letchworth is attached. The first record of the manor is in the Domesday survey (1086). The text of the survey, translated by the Rev. F. W. Ragg, M.A., in the *Victoria County History of Hertfordshire* (pp. 323-4), is, so far as Letchworth is concerned, as follows: “The same William holds of Robert Leceworde. It is assessed at 10 hides. There is land for 7 ploughs. On the demesne are 2, and 9 villeins and (*cum*) a priest have 5 ploughs between them. There are 2 sokemen holding $1\frac{1}{2}$ hides (*de una hida et dimidio*) and 4 cottars and 1 serf. Meadow is there sufficient for a half-plough team, pasture sufficient for the live stock, and woodland to feed 100 swine. Its total value is 6 pounds; when received it was 7 pounds; T.R.E.

¹ Urwick, *Nonconformity in Hertfordshire*, p. 627.

The Garden City

8 pounds. This manor Goduin of Souberie [? Soulbury, in Bucks] held, a thegn of King Edward's, and could sell ; and 3 sokemen, his (Goduin's) men, had 1 hide and 3 virgates and could sell."

Robert Gernon was an Essex baron, "a great Norman, who assisted him (King William) in that famous Battle at Lewis, where he obtained the Crown of this Realm,"¹ whose chief seat was at Stanstead, on the Hertfordshire border, which became known from his successors as Stanstead Montfichet.² Traces of the moat with which the Gernons defended the house and church, together with the signs of earlier fortifications, are to be seen to-day, as well as the moats of the fourteenth or fifteenth century. The arms of the Montfichets are in the north-east window of the church. In the reign of Edward I. the manor was in the possession of the Knights Templars ; they received it as a gift from Richard de Montfichet, who was one of the five-and-twenty barons appointed to enforce the provisions of Magna Charta. After the dissolution of the order in 1312 it became the property of the Knights of St. John of Jerusalem, who sold it in the reign of Henry VI. to Thomas Barrington, who was sheriff for the counties of Hertford and Essex. The Barringtons held the manor until the reign of Henry VIII., when Thomas Barrington sold it to William Hanchet, whose son sold it in the same reign to Thomas Snagge, whose son became famous in his day. This son, Thomas, was born in 1536 at Letchworth Hall ; in 1552 he was entered as a student at Gray's Inn, and two years later, when eighteen years of age, was called to the Bar. In 1571 he became member for the county of Bedford, and was appointed Attorney-General for Ireland in 1577. He held this office for three years, when he returned to England. In 1588 he was returned for Bedford Town, and was chosen Speaker of the House of Commons, November 12, 1588. He held office until the dissolution. He became Queen's Sergeant in 1590, and died in 1592, and was buried in Marston Morteyne church, where an alabaster monument was erected to his memory in 1598. He married in 1562 a co-heiress of Thomas Dikons and acquired the large estates of the Reynes family in Bedfordshire.³

¹ Chauncy, *Historical Antiquities of Hertfordshire*, p. 384.

² *Victoria County History of Hertfordshire*, vol. i. p. 282.

³ *Dictionary of National Biography*.



LETCHWORTH HALL: A BIT OF THE JACOBEOAN BUILDING

Churches and Inns

His eldest son, knighted by James I. in 1603, sold the manor to Sir Rowland Lytton of Knebworth, who built the present hall about 1620. The building is of brick and is a picturesque and interesting example of the Jacobean houses which form the most valuable architectural possessions of this country. The building is T-shaped, the north-east arm, now the kitchen, being apparently of an earlier date, probably part of a fifteenth-century house built by the Barringtons. The tower and other additions on the north-east were added in the middle nineteenth century, and further considerable additions on the north-west and east were made two years ago by the Garden City Company. The latter additions were carefully carried out in the style of the original building, which unfortunately cannot be said for the work done by the previous owner. In the large hall the fine oak screen still remains, though the minstrel gallery over it has been blocked up. There is a carved oak fireplace in the coffee room and a seventeenth-century carved clunch fireplace upstairs. The building is in good condition and, on the whole, well preserved. In years to come, when the company or the town is rich enough, it will be well to secure the building as public property, as, apart from the churches, it is the one centre of historical interest in the town.

V

If in the old churches and in Letchworth Hall we find that which links the Garden City to the past, in the one new inn of Garden City we get as surely one of the curious products of our own time. It has already been pointed out that there is no new public-house in the town. The demand for one was, very naturally, made when the industrial population began to grow, but Garden City, as something of an ideal town, had ideals about the public-house. The decision to which the promoters had come, on an earlier consideration of the matter, was to put the question of the provision of a public-house before the town for the people to settle for themselves. There were in addition to the two inns on the property when it was purchased, already mentioned—one outside the town area at Norton and another at Willian—two other beer-houses, one at Willian on land belonging to the brewers and one on the Stotfold Road, just

The Garden City

beyond the estate boundary. These inns and beer-houses, together with the many public-houses of the adjoining towns, were considered insufficient, and an agitation arose for a new licence in the town centre. After considerable local discussion the directors consented to take a poll of the inhabitants in 1907 on the question of this new licence in the town area, and the result was as follows :

Against	631
For	<u>544</u>
Majority against	87

The voting paper used for the poll is not without interest and reads thus :

“ June 1907.

“ In accordance with resolutions come to last year, and for the guidance of the directors, a vote is now to be taken to ascertain the wishes of the population of Garden City as to whether there should be a public house licensed for the sale of alcoholic liquor near the railway station.

“ The final decision whether there is to be a license or not must for the present rest with the directors, but if they decide that such a licensed public house is necessary or desirable, it will be placed under some form of trust management.

“ You are requested to say on this paper simply ‘ Yes ’ or ‘ No ’ to the question ‘ Do you vote for the establishment of a public house, licensed for the sale of alcoholic liquors, near the railway station ? ’

“ This voting paper is issued to every adult householder (man or woman) and, in case of married householders, one paper for the husband and one for the wife ; a voting paper is issued to every lodger or other adult whose residence in Garden City dates from before Christmas Day, 1906.

“ Any person qualified as above who does not receive a copy of this paper is requested to apply for one at the Estate Office.

Name.	Address.	Whether Householder. ” Householder’s Wife. ” Householder’s Husband. ” Lodger or other Resident.	‘ Yes ’ or ‘ No.’

The company’s distributor will fill in the first three columns.

“ This form will be called for on Monday, 8th July : Please hand same to collector, in envelope herewith addressed to ‘ Chairman of Directors, First Garden City, Limited,’ which please fasten up.”



OLD LETCHWORTH CHURCH



THE THREE HORSESHOES INN, NORTON

Churches and Inns

A year later a second poll was taken, when four questions were put to the residents to vote upon. The number of persons voting was 1708, comprising householders and their wives and any adult lodgers or residents living in the town six months from before the date of the poll.

The residents in the old villages of Norton and Willian did not vote.

The results were :

1. AS TO A LICENCE AT A RESIDENTIAL AND COMMERCIAL HOTEL :

Against	.	.	.	1172	
For	.	.	.	228	
Majority against	.	.	.	944	Neutral 308

2. AS TO A LICENCE AT LETCHWORTH HALL :

Against	.	.	.	1150	
For	.	.	.	249	
Majority against	.	.	.	901	Neutral 309

3. AS TO A PUBLIC-HOUSE :

Against	.	.	.	834	
For	.	.	.	745	
Majority against	.	.	.	89	Neutral 129

4. AS TO AN OFF-LICENCE :

Against	.	.	.	1247	
For	.	.	.	157	
Majority against	.	.	.	1090	Neutral 304

The Garden City

The last poll was taken by the parish council in 1912, the expenses being paid by the company. The result was :

Against	.	.	.	.	1117
For	.	.	.	.	521
					<hr/>
Majority against	.	.	.	.	596

The actual votes recorded at the poll were :

Men	.	.	.	.	869
Women	.	.	.	.	772
					<hr/>
Total votes cast	.	.	.	.	1641
Spoiled votes	.	.	.	.	3
					<hr/>
Total valid votes	.	.	.	.	1638

58.4 per cent. of the women whose names were on the special register voted, and 68.5 per cent. of the men.

This method of dealing with the problem is, under the peculiar conditions prevailing at Letchworth, one to which exception can hardly be taken. The directors could, if they pleased, refuse to let at any time a site for licensed premises, or they could let sites for as many licences as the justices would grant. As ground landlords they have the power to do what they please, and there is nothing implied in the Garden City idea to come into conflict with any action they might choose to take. It is clear, however, that in consulting the wishes of the inhabitants on so vexed a question they are acting in the public interest, and if the people, largely, no doubt, through the women's vote, express their very decided objection to a public-house, their wishes should be respected. It is interesting to note the very large increase in the vote against the public-house on the last poll. The English public-house is, indeed, in these days an institution which has lost the respect of people of all classes, whether they are teetotalers or not. Whatever qualities of good-fellowship and amiability attached to the old inns are lost in the new commercialised drink-shops, and no one can regret that they do not find a place in Garden City. In years to come, with a



THE SKITTLES INN



THE BILLIARD ROOM AT THE SKITTLES INN

Churches and Inns

larger population than exists at present, it may be possible for a different type of inn to be introduced at Letchworth. As it is, the demand for a public-house is not so strong as it is sometimes represented to be; those who like their beer at an inn have got into the habit of walking the mile to Norton or Willian for it.

An interesting experiment by Mr. Aneurin Williams and Mr. Edward Cadbury, in building "a public-house without beer," was initiated in the early part of 1907 when the demand for a public-house first became insistent, and in many respects it fulfills the purpose for which a building of more orthodox character is supposed to stand. There is little that is romantic about temperance inns, or temperance drinks, and it is doubtless true of the Skittles Inn that, like the temperance hotel in Mr. Chesterton's song :

" It thought and thought of most horrible things—
Of health, and of soap, and of standard bread."

But, for all that, it is a popular institution, and, without having any element of philanthropy or any connection with education or propaganda of any sort, it occupies a by no means discordant place in the picturesque setting of Garden City life.

CHAPTER X

ARTS AND RECREATIONS IN GARDEN CITY

"It is expedient that a city be not only an object of utility and importance, but also a source of pleasure and diversion."—WILLIAM FITZSTEPHEN, *Descriptio Londoniæ*.

I

THE chief art in Garden City is, of course, architecture, and next to architecture, gardening. Of these two leading arts something has already been said; so far as the arts allied to them are concerned, decoration, furniture, sculpture, and painting, there is little to be added, for there is, as yet, nothing distinctive of the Garden City in connection with the practice of them. The simple standard in furniture which has been set up has been mentioned as somewhat characteristic of the new town, but the making of that furniture, although it is carried on by one or two local craftsmen, is not on sufficiently large a scale to be noteworthy.

The industrial arts stand on rather a different footing, and in them Garden City has done work of some distinction; which, however, is matter for the next chapter, when we come to consider the industrial side of the place.

In letters there are one or two workers of note, and the minor, more domestic arts of jewellery, embroidery, and the like have many followers.

II

In the way of music it has appeared probable, on one or two occasions, that the town might have an orchestra to do it credit. In the very early days an enthusiastic and accomplished lady organised and conducted a small orchestra which, but for her untimely death, might have been by this time a valuable asset to the town. Recently a promising attempt has been made to form an orchestra



"MUCH ADO ABOUT NOTHING" BY THE LETCHWORTH DRAMATIC SOCIETY



"THE SHEWING-UP OF BLANCO POSNET," BY THE LETCHWORTH DRAMATIC SOCIETY

Arts and Recreations

with Mr. Dalhousie Young as conductor. In the meantime a Philharmonic Society, a Madrigal Society, and a Brass Band add to the gaiety and variety of Letchworth life.

Church music is not an art by itself, though all music is not suitable for church ; in one, at any rate, of the churches of Garden City music is treated as a true art, and it seems appropriate to make some mention of it here. At the Catholic church of St. Hugh the music is governed by the same general ideas as the building and its ornament (of which some account has already been given) and is interesting for the same reason that the church is interesting. All that is cheap or mean or flippant is excluded in music as in everything else, and only what is worth having and worth doing is allowed.

Most of the music is plain-song, sung according to the new official "Vatican" edition, so far as it is yet published. For the rest the Solesmes form is used (a restoration by the Benedictines of Solesmes Abbey in France). A quantity of later music in parts is also sung, but, for the most part, the part singing is not modern ; it is of the Italian polyphonic school of the fifteenth and sixteenth centuries, and is almost as severe in its way as the plain-song. It is by Palestrina, Viadana, Vittorio, or the Germans, Hans Leo Hassler, Bach, etc., and is certainly the most beautiful music one could hear, as well as the most ecclesiastical. A particular feature of the singing of this early music is that it is done at St. Hugh always in four parts unaccompanied. This unaccompanied part singing is the severest possible test for voices. But the church choir, with an enthusiastic choirmaster, inspired by the ideas and aided by the knowledge of Dr. Fortescue, who has himself composed a few things for the church, spare themselves no trouble and do the work remarkably well. At this little church the music is always delightful and always reverently sung.

III

The establishment of a theatre in Garden City is the hope of the Letchworth Dramatic Society ; and in order that the theatre, when it comes, shall be representative of the town and concerned with modern work of the best quality, the society hopes to have its own

The Garden City

company. At present it consists of a company of amateur players, who carry out their own productions, including the making of scenery and costumes and the creation of original methods of stage decoration. Performances are usually given in the hall of the Pixmore Institute, in the industrial area of the town, and, occasionally, small performances are given in a seventeenth-century barn, which the society uses for a scenery and property store. In addition to the playing members, there are other members who support the society by a small subscription, in return for which they receive tickets for the performances. Twenty-six different plays have been produced to date, of which eight have been original works, and two others were given for the first time by English players. Among the plays performed the following may be mentioned :—

Shakespeare, *Much Ado About Nothing* ; Bernard Shaw, *Candida*, *Arms and the Man*, *You Never Can Tell*, *The Shewing-up of Blanco Posnet* ; John Galsworthy, *The Silver Box* ; J. M. Synge, *The Playboy of the Western World* ; Arthur Schnitzler, *An Episode* ; W. B. Yeats, *The Land of Heart's Desire* ; Edmund Rostand, *The Fantasticks* ; Oliver Goldsmith, *She Stoops to Conquer* ; Charles Lee, *Mr. Sampson*, *The Banns of Marriage* ; Charles Lee and C. B. Purdom, *The Garden City Pantomimes* of 1909, 1910, and 1911.

The Garden City Pantomimes, which were not pantomimes at all, were described as “ gently satirical records of local events,” written for people “ who can laugh at themselves.” In them the Garden City, its ideas, and the persons connected with it, were turned upside down, for once in a way, just for the mere fun of the thing. They were, naturally, very popular, and, on the whole, the people who were made fun of took the joke very well. Strictly, the people were not held up for laughter, but rather the ideas with which they were associated, their official positions or situations in which they had recently been found. It was the excellent social feeling in the town which made them possible and enabled them to be treated as an enormous lark. In most other places slow-witted people might have found them full of offence. They were a trifle daring and impudent, it is true ; but they were none the worse for that. The music and songs by Mr. Lee, and the costumes and scenery by

Arts and Recreations

Mr. and Mrs. R.P. Gossop, made them a good bit out of the ordinary. Says Mr. Belloc, in his essay on Saturnalia, "One thing is sure, though the sureness of it reposes on some base we cannot see: in the proportion that men are secure of their philosophy and social scheme, in that proportion they must in some fixed manner turn it upside down from time to time for their delight and show it on a stage or enact it in a religious ritual with all its rules reversed and the whole thing wrong way about. They have always done this in healthy States, and if ever our State gets healthy they will begin to do it again."

In explanation and defence of the work of its amateur company the society says in the statement of its objects something that is worth quoting: "The place of the amateur in the practice of the art of the theatre is one which only needs to be stated to be recognised as legitimate, in spite of the popular prejudice that amateur theatricals are usually rather frivolous entertainments designed for the amusement of the friends of the players. As those who work in the Letchworth Dramatic Society understand it, the drama, and the representation of the drama upon the stage, which is what is meant by the Art of the Theatre, is a serious and pleasant pursuit which is by no means below music and the fine arts in the appeal it makes to the emotions and the imagination; and the playing on the Letchworth stage by the company of amateur players is no attempt on their part to emulate professional actors, but is practised by them in the same spirit as was the amateur performance of music by our great-grandfathers or the amateur practice of our English sports before they fell into the hands of the mere professional. The Letchworth Dramatic Society encourages amateur playing for its own sake, believing that it is a healthy and enjoyable recreation; believing also that in the following by amateurs of the art of playing, for their own entertainment and the entertainment of the town in which they live, work of real value can be done, any loss of technical brilliance being made up for by the sincerity and freshness of their work."

The ultimate aim of the society, it has already been said, is the establishment of a Letchworth Theatre and a permanent company of Letchworth players. The proposal of the society for a Town

The Garden City

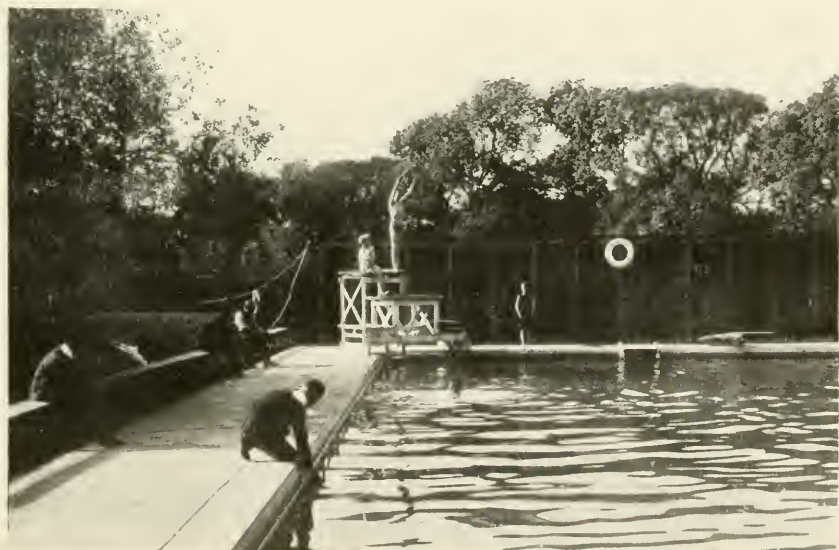
Theatre has much in common with the repertory theatre movement which has arisen in recent years. This movement is an attempt to localise the theatre and to secure the performance of plays of a more or less intellectual and artistic quality. The aim at Garden City is, however, to organise the theatre as a popular social institution, and, to that end, plays of all kinds, embracing the widest possible appeals, will be given. The theatre would depend for its support upon a body of local theatrical opinion, and would seek to give the best kind of plays, produced in the best manner, minimising the commercial element which is usually predominant. The special circumstances obtaining at Letchworth would seem to allow the proposal some chance of success, and if sufficient financial support is given to it to enable it to be carried out it will provide, among other things, what may be expected to be a valuable addition to the attractiveness of the artistic and social life of the town.

IV

Of the recreations of Garden City it can only be said that they are as recreations are elsewhere. Each man chooses his own. And though every one may not golf, nor play cricket, nor tennis, nor even spend his leisure in his garden, it is certain that he has a recreation of some sort which does for him what these things do for others. "Recreations" is indeed a wide term. There are many who choose to talk, or hear others talk, to debate and argue about all things under the sun. "Like the youth in the Philebus they are ready to discourse to any one about a new philosophy." And to continue the quotation from Jowett's introduction to the *Republic*, though perhaps rather unkindly: "they are generally the disciples of some eminent professor or sophist, whom they rather imitate than understand." Let this be as it may, there are many who follow the art of talking, and in this we get a suggestion of one of the many likenesses between Garden City and *Utopia*. In writing of the people who lived in that happy city, Sir Thomas More said: "Howbeit a greate multitude of every sort of people, both men and women, go to heare lectures, some one and some an other, as everye mans



THE GOLF COURSE: THE WATER HAZARD AT THE SEVENTEENTH HOLE



THE OPEN-AIR SWIMMING BATH

Arts and Recreations

nature is inclined. Yet, this notwithstanding, if any man had rather bestowe this time upon his owne occupation, (as it chaunceth in mayne, whose mindes rise not in the contemplation of any science liberall) he is not letted, nor prohibited, but is also praysed and commended as profitable to the common wealthe."

Every lecturer and speaker of note comes to the Garden City at one time and another, and is sure of an audience which, in every matter open to public discussion, is one of the most lively, critical, and entertaining audiences to be found anywhere.

There are not a few, however, in the town "whose mindes rise not," and they find their pleasure in the open-air recreations which are what most men mean when they use the word. In this respect the town, as might be expected, is very well served. The Golf Club has one of the most picturesque and delightful courses in the south of England, and the subscription to the club is sufficiently low to induce every one with the least natural weakness for the game to succumb to it. Cricket, tennis, bowls, football, and hockey have each their ardent followers, and the clubs are too numerous to mention. For fishing there is the Ivel, which runs through the north of the rural belt.

Walking, cycling, and motoring are pursuits that every man may indulge in as choice and circumstances guide him, and Garden City is particularly well placed for all three. For the walker the country round is full of interest and charm of scene, and the rural walks in "hearty, homely, loving Hertfordshire" are hardly to be bettered anywhere. The cyclist and motorist are close to all the great roads to the north and south, which is all they need for their enjoyment.

CHAPTER XI

GARDEN CITY INDUSTRIES

"For, indeed, we should be too much ashamed of ourselves, if we allowed the making of goods, even on a large scale, to carry with it the appearance, even, of desolation and misery."—WILLIAM MORRIS, *News from Nowhere*.

I

THE entire success of the Garden City depends upon the extent to which it can be made a place of business. As a merely residential town it would provide a useful object lesson in the harmonious grouping and economical laying out of a residential area, and, as such, would be, no doubt, a pleasant place to live in. But its value as a contribution to the remaking of town life would be gone. No one can believe that the towns of the future will maintain the characteristic features of the present transition period in which men live in one place and work in another. Twenty years ago the prospects of an increase in the facilities for rapid travel seemed to hold out promise of a solution to the perplexing problem of where to live, which troubled both the rich and the poor. By means of the motor car the rich would find a home deep in the country, while the poor would go to their homes in distant working-class suburbs by tube, tram, rail, or bus. To-day, however, with travel becoming hourly cheaper and more rapid, the problem still troubles us all, and it is obvious that the cure of it is not to come that way. The towns are becoming larger and less habitable, and the worker of all grades is being pushed further and further away from his place of work.

II

Throughout the last century, as an alternative to the town, enterprising business houses, here and there, transferred their works bodily from the centre to country districts. In few cases, for obvious reasons, did they go far from a town, and the results of



A GARDEN CITY FACTORY WORKS ROAD



GARDEN CITY FACTORY: WORKS ROAD AND PIXMORE AVENUE

Garden City Industries

such decentralisation as there was were sometimes good, but occasionally the reverse. But inevitably, where success was obtained, the town at last worked its way out to the new settlement and swallowed it up. The only exceptions to this rule were Bournville, Port Sunlight, and similar places, where the special circumstances and the foresight of their founders mitigated such unpleasant results, also the instances where isolated factories were moved into country towns. "Factories," says Dr. Arthur Shadwell in *Industrial Efficiency*, "are constantly being put down in country places. All about the great towns . . . are such places; quiet and sometimes charming villages, where there is a mill or two and hard by a few rows of entirely excellent cottages for the workpeople, co-operative stores, a reading room, and the like, with a minimum of public-house accommodation. Almost ideal in a plain way. And what happens? The ideal village makes all the haste it can to grow into a town and to imitate other towns."

None of these attempts have aimed at breaking up the town and spreading it, with all its various activities, over the country. Yet that, it seems reasonable to suppose, is the one way in which the twentieth century will solve the problem of the town, which is also the problem of industry and the home. The towns will be split up and scattered and will make innumerable small and compact residential and industrial centres, which rapid transport will bring close together and link up with London.

The Garden City is the first organised attempt to give effect to that movement. Its promoters said of it, years before it was founded, that it would "possess a greater measure of productive power than a town built up in a chaotic and unsystematic manner;" there can be no doubt in the minds of those who watch the signs of the times that the conditions of industry prevailing there are among the most efficient of our day.

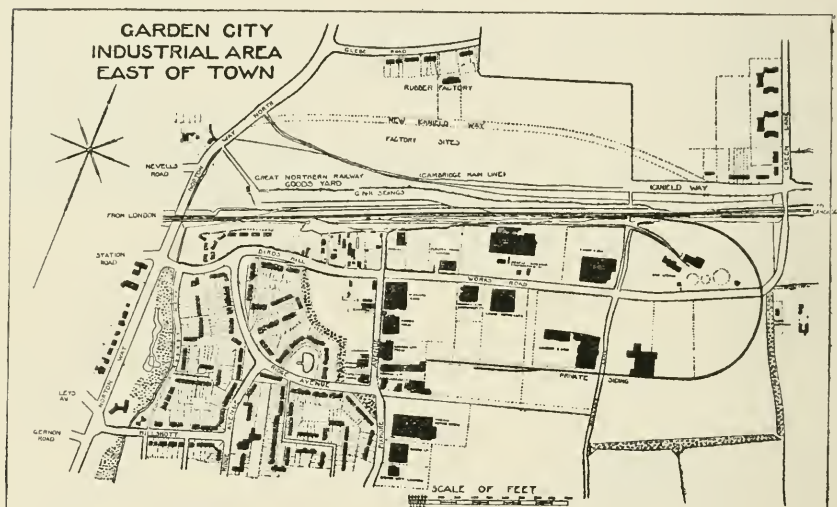
III

The industrial development of Garden City has kept pace with its residential development, if it has not slightly outstripped it, so that the town as it exists may be considered to be representative of

The Garden City

what it will be when it is happily finished. It is, so far, less than a quarter the size it will be when that day comes, so that we may roughly estimate that its factories will be more than four times as numerous as they now are.

The Garden City Company is engaged in providing the necessary facilities for industrial purposes, and in bringing the advantages of the town as an industrial centre before the notice of manufacturers. The securing of new industries for the town is one of the most



important branches of the company's activities, and in view of the fact that within recent years the competition among growing towns for new factories has become very keen, the company needs to keep a watchful eye upon all new industrial developments throughout the country. Seven years ago when industries first came to the town the Garden City was still very much in the air, but to-day, with its rapidly increasing population, with its numerous factories and its modern equipment, its unique claims as a centre of industry are based upon actual achievement. There is no reason why the town, now well established and well supplied with every kind of facility, should not go on to completion at a rapid rate.

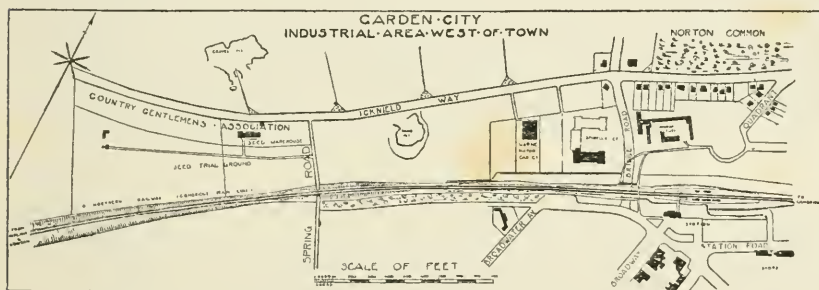


THE ENTRANCE TO A GARDEN CITY FACTORY (COUNTY GENTLEMEN'S ASSOCIATION, LTD.)

Garden City Industries

The Garden City factories are comparatively small, employing from two to four hundred people each, and are engaged in a variety of industries. This variety is without question a good thing for the town, for dependence upon one large works, or upon one trade, is not without its grave dangers to a community. The number of separate employers and the different businesses add to the stability and balance of the place.

The buildings are generally of the single-story type, which allows for easy extension and is convenient for lighting, heating, economical handling of material, and the reduction of risk of extensive damage by fire. In most instances care has been taken in their



design, and the buildings are not unpleasing. There is no need for pretty factories, it is true ; but none the less they can easily escape sheer ugliness. They are grouped in an area to the east of the town where the head gas and electricity works and the goods sidings and private sidings are. A new area has recently been opened to the north-west for light trades. The reason for this was that the original factory area was inadequate, and it was undesirable to develop too close to the town of Baldock.

Printing, bookbinding, and various branches of engineering are the chief industries, and there are at least a dozen others. In many of them work of high quality is done, so that it may be said that Garden City industry bears a note of distinction. Before, however, an account is given of some of the most interesting of this work, it will be well to give attention to the conditions under which it is carried on.

The Garden City

IV

What are the reasons that bring particular manufacturers to Garden City? There must be many good ones, otherwise they would not have come, or, having come, would have departed. The principal reason is, naturally, an economic one. In London and other large centres rents and rates are so high as seriously to interfere with the development of industry, and room for expansion is not only expensive but limited in extent, where it is not actually absent. Progressive industry seeks not only the lowest dead charges, but a means of extension of its operations. This can only be secured where land is cheap. The bulk of the land of this country is cheap; it is only in the crowded towns that it reaches enormous figures. If we could supply to this cheap land the necessary facilities of light, water, power, and transport demanded by industry, then the £3000-per-annum acres in the city would be deserted. That is what Garden City has done. It has brought to agricultural land all the practical means of industry; so that modern factories may be established under the most advantageous economic conditions.

In addition to the direct economic benefits which such an organisation as the Garden City provides, there are other indirect, but none the less valuable, ones. The workpeople can be housed near their work under healthy conditions; the factories also will be light and healthy. Says Dr. Arthur Shadwell in his survey of English, American, and German industrial conditions, "The physical conditions under which work is carried on undoubtedly exercise an influence on efficiency, not only through their effect on the health and strength of the workers, but also on account of the facilities or hindrances to working involved."¹ Attention to such matters is not of the nature of philanthropy on the part of the employer. It is necessary for getting the best results. Where employers have seen to the health of their workpeople they have the satisfaction of knowing that they have strong rather than sick men in their shops, that less time is lost through illness, and that more

¹ *Industrial Efficiency*, vol. ii. p. 47.



THE BINDING AND PRINTING WORKS OF I. M. DENT & SONS, LTD.



WOMEN'S DEPARTMENT—THE BINDERY OF J. M. DENT & SONS, LTD.



MEN'S DEPARTMENT THE BINDERY OF J. M. DENT & SONS, LTD

Garden City Industries

vigorous work is done. In America, where more consideration is given to details of this sort than with us, there is undoubtedly very little sentiment involved. It is plain business. As Mr. Arnold Bennett was told over there, "It is better for the employees. But we do it because it is better for us. . . . We get results from them."¹

Five years ago Mr. C. H. St. John Hornby, of the firm of W. H. Smith & Son, delivered a speech in Garden City in the course of which he mentioned the experience of his firm, who had not long removed their works there. He said: "I can speak from personal experience with regard to our own works here. When we decided that we would move our bookbinding works from London we looked about for a suitable country site, and were not actuated by any philanthropic motives whatever; I do not wish to take any credit to ourselves for trying to do anybody a good turn; we simply wanted to get the best site we could for our works; we visited a large number of places, and amongst others we visited Letchworth; we came to the conclusion, after careful consideration, that Letchworth presented greater advantages than any other place we had visited, and so we decided to put up our works here. Those works have now been in operation for one year, and though we were told before we started that we should have grave difficulties with regard to labour and everything else, and in dealing with the Garden City itself, and though all kinds of things were predicted for us, I can fairly say that, after working over a year, we are absolutely satisfied with having come here. We do not feel that any place in England would have suited us so well, or given us such facilities as this place has given us. We have any amount of space at a reasonable rent; we have all our factory on one floor; we do not have to go upstairs and downstairs as we must in London; we have ample room for expansion; we have nice cottages for our workpeople; we find that they like the place, that they do not want to go back to London, as we were told they would, and we also find that their wives like it—which is more important."

As the speech is not of recent date, the present writer asked Mr. Hornby if he had any objection to a quotation being made from it, and in expressing his willingness for its publication Mr. Hornby

¹ *Those United States*, pp. 114-115.

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said : " You may add that since that date my firm have had no reason to change their opinion with regard to Letchworth as a site for industrial purposes."

The firms at work in Garden City have mainly come from London ; though others have removed from Leamington, Royston, Bury, U.S.A., Southampton, Leytonstone, and elsewhere. They were all asked by the present writer to say why they came to Letchworth and what advantages they find in working there. A number of them declined to make any statement. It is easy to understand that jealousy of trade rivals would hinder them in some cases from making public any particular advantages that the new town affords them.

The replies received are given below, the identity of each firm being hidden under an index letter.

- A. Nearness to London ; abundance of room for light and healthy workshops ; healthy conditions of living for workmen and their families.
- B. Central ; close touch with London market ; also healthier conditions for workpeople.
- C. Larger factory required for extension of business ; low rates, moderate ground rents, water, gas, and electricity ; men live near to works.
- D. More room ; low rates.
- E. Healthier working conditions ; low ground rent ; room for expansion of works.
- F. Proximity to London ; exceptionally good class of employees available.
- G. Health of men ; possibility of cohesion of staff when in small town.
- H. London workshop was too small for the business ; it was hoped that by coming to Letchworth instead of to some other place outside London the creation of the usual slum area that grows up around country factories would be avoided. On the whole, the move to Letchworth has been successful.



EXAMPLES OF WORK DONE AT THE FACTORY OF J. M. DENT & SONS LTD.

Garden City Industries

- I. Desire to participate in the establishment of a new city on ideal housing and town-planning lines ; low ground rents and low rates.
- J. Easy access to London.
- K. We came to Letchworth because we could get more room and a better life for our employees. We feel certain that we have given their lives a better chance ; especially in the fact that we have at least doubled their hours of leisure in that they are close to their employment and save the fearful waste of time in travelling.
- L. Desire to become associated with the ideal of the Garden City. To say that Letchworth has no disadvantages would give us pleasure, but would not be entirely true. But for ourselves, we have pleasure in saying we are glad we came here, and have never regretted our change.

V

It will be interesting to glance very rapidly at the work done in these Garden City factories. The largest and most important of them are those connected with the printing and bookbinding trades. The bookbindery of Messrs. W. H. Smith & Son, removed in 1907 from Goldsmith Street, Drury Lane, is under the control of Mr. Douglas Cockerell, one of the best-known bookbinders in the country. It is a handsome building of which its proprietors are justly proud. Bookbinding in all its branches is carried on, a special feature being made of the repair of valuable documents, such as ancient records, parish registers, etc.

The Arden Press of Leamington came to Garden City at the same time as the binding workshops just mentioned, and was then acquired by the same firm. It had already, however, under the control of Mr. Bernard H. Newdigate, set up a standard of fine printing, which the resources of its new proprietors have enabled it to develop. Letterpress printing, including fine commercial work, are its specialities. It has a style of printing somewhat severe as compared with that of most printing houses, owing to restraint

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in the use of ornament and the rejection of any which is wanting in congruity or good taste. The high quality of its work is due to the choice of good letter and its studied use, and also to consistent aim at excellence in every detail. Amongst the books lately produced at the press are : *The Gold and Silver of Windsor Castle* ; *The Objects of Art in the Collection of the Baroness James de Rothschild* ; *The Collected Works of William Morris*, now being published in twenty-four volumes by Messrs. Longmans, Green & Co. ; the Florence Press books, printed in the type designed by Mr. Herbert Horne and published by Messrs. Chatto & Windus ; and liturgical and other books published by Messrs. Burns & Oates.

Messrs. J. M. Dent & Sons, Ltd., have a large factory on five acres of land in which they print and bind their famous *Everyman's Library* and other publications. It is a highly specialised business, largely done by machinery and employing many people. The factory is equipped with all the latest English and foreign printing and binding machines, and turns out more than three million volumes annually.

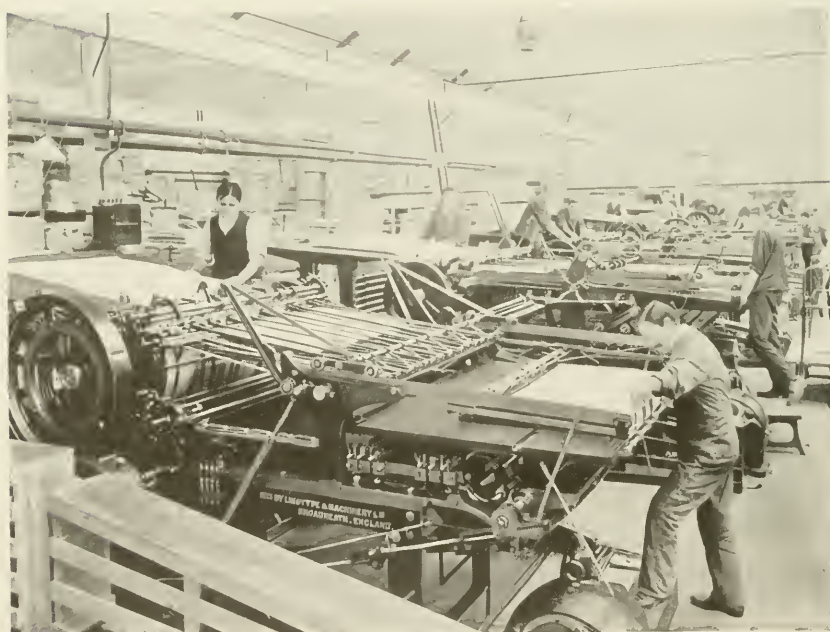
The Garden City Press, Ltd., is a co-partnership undertaking established in Letchworth in 1905. It carries out commercial letterpress printing, as well as the printing of books and magazines. Lithographic printing and the making and binding of account books and publishers' binding are also done. The business has had a steady growth, and the factory has been enlarged several times.

The Letchworth Printers, Ltd., has had a somewhat romantic career, being started by several energetic compositors in a temporary workshop at the top of a house. From there the first number of the Garden City weekly paper, the *Citizen*, was published. The firm now specialises in the production of catalogues and booklets for London business houses.

The Addresslet Company, Ltd., label and general printers, and the Hayes (Universal) Printing Machinery, Ltd., are two other firms engaged in an industry which appears to be one specially suited to Garden City. The Hayes Company are colour printers developing a new process, invented by Mr. Jefferson Hayes, of printing lithographically from the reel on textiles, paper, linoleum, and other material.



EXAMPLES OF BINDING DONE AT W. H. SMITH & SON'S FACTORY



THE MACHINE ROOM AT THE ARDEN PRESS

Garden City Industries

VI

The many branches of the engineering trade in Garden City cause that industry to rival the one just mentioned for the premier place in the town. The factories are of a good kind, and show every sign of prosperity. Messrs. The Heatly-Gresham Engineering Co., Ltd., and Messrs. Ewart & Son, Ltd., are engaged in iron and brass founding. Ewart's geysers are known all over the world, and the factory in which they are produced is one of the best organised undertakings in the place. The Lacre Motor Car Company, Ltd., are manufacturers of commercial cars, and the Phoenix Motors, Ltd., and the Pearsall-Warne Co., Ltd., are makers of small motor vehicles. The Phoenix car is one of the most popular small cars on the market, and the business is extending at a remarkable rate.

VII

Of other industries there is the very appropriate seed testing, growing, and packing business of the Country Gentlemen's Association, Ltd. The factory and offices were designed by Mr. R. F. Johnston, and are a fine example of modern architecture. Another large factory is that of the Spirella Company of Great Britain, Ltd. This company, although run by English capital, is the offshoot of an American industry, and commenced its operations in 1910 in temporary premises. The business is the making of high-grade corsets for what is described as "special custom work." The undertaking has been extraordinarily successful. Extensions to the present permanent factory are already begun, and preparations are in hand for more than duplicating the present accommodation. The building is heated by forced air, and lighted by the inverted light system. On the top floor is a reading room and restaurant, and a flat roof for recreative purposes. Bathrooms are provided for employees. Eighty per cent. of the employees are girls, and the company pays special attention to the provision of social facilities; dances and other entertainments are arranged, and every effort

The Garden City

is made to bring the workers in the different branches of the business together and to get them interested in the concern. It succeeds, in consequence, in getting a particularly good class of girls.

The St. Edmundsbury Weaving Works were started in 1902 by Mr. Edmund Hunter as a small handloom industry at Haslemere, Surrey, and removed to Garden City in 1908. The aim of the works is to produce fabrics rich in material, bold in design, and of fine colour. Dress fabrics and furniture stuffs are made for London and the Continent; ecclesiastical vestments and altar hangings are a particularly successful branch of the industry, the work finding place in St. Paul's Cathedral, the private chapels of Windsor and Buckingham Palace, as well as in many churches in England and abroad. A considerable amount of work in conjunction with well-known theatre artists has been done, fabrics being specially woven for many plays, amongst others *Nero*, *Antony and Cleopatra*, and *False Gods*.

The move to Garden City took place in consequence of the extension of the business and the need of power looms for the production of continuous quantities of plain silk material; here hand work and machine work go on side by side to their mutual advantage. On several occasions exhibits from the weaving works have been sent by government request to the Arts and Crafts Sections of the International Exhibitions of St. Louis, Milan, New Zealand, Ghent, etc. It may be mentioned that the damask altar hangings for the coronation of King George and Queen Mary at Westminster were woven at these Garden City works.

The Icen Pottery was established in Letchworth in November 1908. It is concerned with the manufacture of pottery in which an endeavour is made to satisfy utilitarian requirements, at the same time aiming at a high standard of artistic excellence. Lead as a basis of the glazes is not used by this firm in any form, so that the produce shows the possibility of entirely eliminating the danger of plumbic poisoning in pottery manufacture. Some excellent work is done by the pottery and its products are very highly valued.

The Foster Instrument Company are manufacturers of scientific instruments, particularly electrical pyrometers for industrial temperature measurement; the Kryptok, Ltd., make a new kind of lens; the



FACTORIES ON PIXMORE AVENUE



THE MACHINE-SHOP, PHOENIX MOTOR WORKS

Garden City Industries

Kosmos Photographics, Ltd., produce photo papers ; and Kinora, Ltd., are makers of cameras. Organ building, asphalt making, joinery and cabinet making, Swiss embroidery, stationers' sundries, and laundry work are among other industries.

VIII

Among the chief objects of the establishment of the Garden City was to be this : " To find for our industrial population work at wages of *higher purchasing power*, and to secure healthier surroundings and more regular employment " (*Garden Cities of To-morrow*, p. 21). The Garden City, then, was to improve the position of the worker. Has it done that ? The answer is that it certainly has. And it has done it not in any revolutionary or socialistic sense, but by providing better physical conditions for him and his wife and family without infringing on their personal liberty. The workman in the Garden City is at least as free as he is in the great towns. One of the vital problems of our time is how to make the mass of men better off without bringing them into more complete servitude. The common objection to social reform is that while it may give certain benefits, real or dubious, with one hand, it takes away all that makes those benefits of value with the other. This, at least, the Garden City does not do. Whatever advantages the worker gains through living and working under the more wholesome conditions of Garden City are not at the cost of his independence. The town is large enough to enable him to be free from his employer and his employment when outside the factory ; there is no interference with his leisure, and there is not the slightest suggestion of paternalism, benevolence, or philanthropy in the atmosphere of the place, such as might exist or might be feared in a smaller scheme, or in a town dominated by a single employer. In the matter of wages the rate of pay is lower than in London, but higher than in the surrounding towns. Trade union rates are recognised in all the trades with, perhaps, minor exceptions in the engineering trade. It is the only town in the country in which a forty-eight hour week is observed in every printing-house in every branch of the trade. On

The Garden City

the whole, food and other prices are not less than in London, but rents are considerably less for better accommodation. The standard of life, health, and cleanliness is very much higher than in London and other towns. There is no poverty nor unemployment, except to a slight extent among the utterly inefficient and incapable. The economic position of workmen in Garden City, without being ideal, without being even what it should be, is distinctly superior to what it is elsewhere.

IX

It will be seen from what has already been said that the Garden City is already a by no means insignificant centre of industry. As a growing town yet in its infancy it has many opportunities for effecting improvements in its industrial organisation, and of adapting itself to the needs of the manufacturing concerns which are its backbone. In asking the heads of firms what they wanted in the way of improvements in the town, the unanimous answer was, "More of it," "More factories," "More good-class factories giving employment to well-paid labour," "The increase of the town." These were their actual words. Although suggestions were made of improvements in detail, such as, "Better train service," "Educational facilities for the higher grade of workmen," "A market, theatre, and other places of amusement," yet it is generally believed that all these additions to the amenities of the place are bound to come as the town reaches larger proportions. The absence of an ordinary public-house in the town centre is not, on the whole, regretted, though opinion is divided; many employers state quite definitely that the present conditions have a tendency to keep men steady. The further development of the town is, then, the only thing that is most wanted from a manufacturer's point of view. And this development waits upon nothing but the perception of the economies and actual realisable advantages the town offers to industrial undertakings, at present working in the crowded areas and vitiated atmosphere of the great cities. It is no easy matter to get the conservative manufacturer to see the benefits of the twentieth-

Garden City Industries

century Garden City conditions ; it is no easy matter, when he has been got to see them, for him to transplant his works on new soil. But complex and difficult as the matter is, it can be done, and done with amazingly successful results as the Garden City industries already show. It is for men of courage, determination, and some touch of imagination to seize the unique chance of the Garden City and turn it to their own ends and the ends of commerce. Industry requires men of genius to accomplish great things, as the arts and politics do. The Garden City industrial elements will not develop to the fullest extent possible until they are worked upon by men of fine and vigorous intelligence. Then, and only then, will the town abundantly flourish.

CHAPTER XII

WORKMEN'S COTTAGES IN THE GARDEN CITY

" We have kept in view . . . relation of cost to appearance, accommodation, comfort, durability, fittings, suitability of material, and efficient workmanship. . . . "

I

THE cottage and the small house are the distinctive Garden City types of building, and of these the workman's cottage is by no means the least interesting. When we come to think of it there is no reason why it should lack interest. Think how much of the charm of our English villages is due to the cottages of labourers and farm workers, and you will realise that there is no need for the inexpressibly hideous erections in which the working population of our towns is housed. The old cottages of our countryside date from a time when building was simple and honest, and they bear upon them the character of the locality and some fine qualities of national life. They contain what is most vital in our English architecture, and wherever they are found they are a delight. Our modern building is somehow strangely different. The houses built for working people are so mean, and the aggregation of them is so horrible, that no one cares to be near them. They are not only hideous and badly built, but they destroy whatever beauty the land on which they are placed may have had. Wherever they are, in town or country, they are an offence to God and man. The heritage of ugliness left by the nineteenth century is in nothing more abominable than in the industrial dwellings, tenements, and "fowl houses" in which the mass of the people is housed.

II

In Garden City the best and most constant thought has been directed towards providing good and economical cottages for the working classes, with the result that the industrial part of the town is not different in character from the rest of the place. No one would wish to avoid the workmen's cottages because they were



OLD COTTAGES AT NORTON VILLAGE



OLD COTTAGES AT LEITCHWORTH VILLAGE

Workmen's Cottages

unpleasing. Even the cheapest cottage has some elements that are attractive, and is in harmony with its surroundings and possesses all the physical qualities that a home should have. At one time it was argued that no working man could afford to live in anything an architect could design ; but at Garden City the workmen's cottages, with hardly an exception, are the work of architects. There is, indeed, a rivalry in cottage planning greater, perhaps, than in any other kind of planning whatever.

And the cottages are not merely " nice scenery." Such an objection has been made to some of them, and occasionally perhaps with justice ; but on the whole they are practical and sensible buildings. Middle-class theory has influenced them to some extent ; but the actual demands of the workers and considerations of a business nature have kept the operation of such theory within bounds. The attempt to give the working man what he ought to like, and even to force upon him what he actively dislikes, is characteristic of our time ; it is no wonder that the Garden City should show some signs of it. Had the place grown up free from the pressure of necessity there is no telling to what lengths the following of peculiar fads and fancies in building might have led it. The cottage builders have had, however, to meet the requirements of men and women brought out of large cities, and accustomed in most cases to the very real conveniences of jerry-built houses. There is no mistaking the fact that the jerry-builder does know how to make his houses practical ; they may be vilely constructed of the worst possible material and their life may be short, but they have certain conveniences and economies appreciated by housewives. Of course, the greater part of working-class housing has not even the good points that some jerry-building possesses. It is utterly vicious. But when men and women have been brought up to what is bad, they will not like the good as soon as they see it ; accustomed to the bad house, they will not at once appreciate the good one. Therefore at Garden City we have had a conflict between the architect and builder on the one hand, and the tenant on the other. The tenant wants the cottage he has had in his old home, with its back-projection and its touch of the villa ; while the architect wants to give him a really hygienic cottage with a designed exterior. The new cottage does

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not fit the tenant's furniture, and he finds it horribly inconvenient. Consequently he objects. The strife which thus goes on between the two, a strife in which the architect rarely figures in person (would that he did !), helps to keep cottage building sane and practical. The bulk of the cottages are, indeed, excellent in every way ; they come to be appreciated even by that invariable conservative, the workman's wife. More than once the writer of this book has heard a workman say after a visit to his old home, " I wonder how we ever lived there at all."

III

How to build a healthy cottage at a rent the workman could afford to pay was a problem which the directors of the Garden City had early to face. It was a serious problem, for they depended for the success of their enterprise upon a large working population. In meeting it they had to be practical, while putting as high as possible the demands of hygiene. They had no onerous restrictions imposed upon them by the by-laws of the local authority, but they had to recognise a standard which would prevent the possibility of every sort of insanitary condition. They did this by means of their building regulations. These regulations do not hinder cheap building ; but they provide the necessary sanitary minimum (the area of plots, the cubic contents of rooms, lighting and ventilation, drainage, and so forth) for sound building.

" The question of money should always be a secondary matter," said Mr. Baillie Scott, talking of cottage building on one occasion ; which may be good advice for artists, but not for business men and workmen : they may be wrong, but they will laugh at it. The question of money is, indeed, the leading question in all matters connected with the workman's cottage. The most rigid economy, the sacrifice of all luxuries, and the recognition of good construction are the very first principles of cheap cottage building. At Garden City these matters have been given considerable attention ; and it may be admitted that the problem has been in a large measure solved. The Cheap Cottages Exhibition of 1905 and the Urban Housing Exhibition of 1907 were of value, partly in the direction of making known new materials (though so far as Garden City is



WORKMEN'S COTTAGES AT SHOTT LANE (LETCWORTH HOUSING SOCIETY, LTD.)



LYTTON AVENUE

Workmen's Cottages

concerned no material has been found cheaper than the local bricks), and partly in directing attention to economies and variety of planning.

The standard type of the smallest Garden City cottage may be taken to be one containing living-room, scullery, and three bedrooms, built of the local brick, nine-inch walls covered with cement rough-cast, tiled roof, one of a block of four or six; costing complete, with fencing, drainage, gas, water, paths, concrete yard, and garden, from £150 to £155; let at an inclusive rental of 5s. 6d. per week (£14 6s. per annum). With a parlour in addition the extra rent is from 6d. to 1s. per week. This rent shows a net return of 4 per cent. on the cost. These cottages would have a little less than a twelfth of an acre of garden; and in most cases allotments are available close at hand for those who desire them.

The following table contains particulars of the rents and accommodation of the cottages built by the Letchworth Cottages and Buildings, Ltd.:

Accommodation.	Weekly Rentals inclusive of Poor and Water Rates.											Totals.
	4/3	4/6	4/9	5/-	5/3	5/6	5/9	6/-	6/3	6/6	6/9	
(a) Living - room, scullery, and two bedrooms . . .	-	12	10	14	2	3	-	-	-	-	-	41
(b) Living - room, scullery, and three bedrooms . . .	6	-	-	2	3	50	21	2	-	1	-	85
(c) Parlour, living-room, two bedrooms, and bath-room . . .	-	-	-	8	4	-	-	-	-	-	-	12
(d) Parlour, living-room, scullery, and two bedrooms . . .	-	-	-	-	1	3	1	-	-	-	-	5
(e) Parlour, living-room, and three bedrooms . . .	-	-	-	-	-	-	-	-	4	1	1	6
(f) Parlour, living-room, scullery, and three bedrooms . . .	-	-	-	-	14	8	2	10	2	3	1	40
	6	12	10	24	24	64	24	12	6	5	2	189

The Garden City

This cottage company was incorporated for the special purpose of the erection of workmen's cottages, and its work may be taken as representative of what is done in the town for the provision of workmen's cottages. It is not a philanthropic undertaking, but at the same time it is not speculative. The rents are fixed at the lowest possible figure to allow for a net return of 4 per cent. on the capital invested. The total cost of building has been from £132 to £173 per cottage. It should, however, be borne in mind, in considering the figures, that since these cottages were built, about three years ago, the cost of building has increased from 15 to 20 per cent., and is still slightly on the upward tendency.

At these rents, which, after deducting ground rent and rates, work out at an average return of 6.6 per cent. gross on the capital cost, the company is able to pay 4 per cent. on its preference share capital and 5 per cent. on its ordinary shares, and to carry a balance forward. One half of the value of the cottages was obtained on loan from the Public Works Loan Board, for 30 years at $3\frac{1}{2}$ per cent. Provision is made for repairs and maintenance of the property at the rate of £2 5s. per cottage, per annum, and a sinking fund is being created for the redemption of the leases. The company has very few empties, as its cottages are popular.

An inspection of these cottages was undertaken at the end of 1911 by three independent experts (Miss Constance Cochrane, Mr. Thomas C. Barralet, and Miss Churton), who invited the opinion of the tenants as to the general convenience of their homes and surroundings. "They were encouraged to speak freely as to any existing drawbacks and as to any improvements they might desire in a new cottage. . . . Without exception the cottagers received us with courtesy, and gave their views without reserve. As compared with the ordinary cottage tenant they seemed very well satisfied with their abodes, and we heard no criticism to indicate that the rents were considered excessive. . . . For the greater part they appeared to be of the urban artisan and labouring class. . . . Very few are in a state of actual indigence, and the furnishing of many of the cottages indicates that the tenants are in fairly comfortable circumstances. A large proportion are evidently new to country life, having been imported from London by the recently established



WORKMEN'S COTTAGES AT COMMON VIEW (LETCWORTH COTTAGE BUILDINGS, LTD.)



WORKMEN'S COTTAGES BUILT BY THE HITCHIN RURAL DISTRICT COUNCIL
ON ICKNIELD WAY

Workmen's Cottages

factories. Large families of six or seven children were met with, but we did not hear that lodgers were taken in any extent."

The inspectors summarised the criticisms of the tenants as follows :

Living-Room.—The largest rooms the most popular. More cupboards desired as a rule. Also shelves and kitchen dresser where absent. Objection to copper and bath in living-room.

Scullery.—Size of smaller sculleries found very inconvenient, especially with large families. Concrete flooring disliked, bricks or tiles preferred.

Copper.—Brick-set copper preferred to gas ones sometimes supplied, as helping to get rid of combustible refuse. Some complaints of steam rising to bedrooms.

Bath.—Majority appreciate bath, but grudge space occupied in scullery. In two cottages visited with bath in lavatory tenants expressed great satisfaction with arrangement.

Doors and Window-frames.—Complaints in several instances of these being draughty and ill-fitting.

Windows.—Top lights to open, especially in bedrooms, much appreciated.

Larder.—Generally considered sufficient. Size of a few found inconveniently small. Complaint of dust where unceiled above. Sunny aspect much objected to.

Parlour.—In a few instances considered too small. Great objection when used as passage room.

W.C.—When immediately inside back door some tenants complain of publicity and aerial communication with interior of house. Others complain of publicity of outside door, but most tenants raised objection to both positions.

Gas.—Seldom used in bedrooms.

Coals.—Larger storage capacity frequently asked for, in order to buy more when cheap.

Stairs.—No complaints, except want of hand-rail where absent.

Bedrooms.—Great appreciation of the larger bedrooms. Several complaints made of size of smaller rooms and of difficulty in placing beds. In some cases objections raised to sloping walls as inconvenient for furniture. A desire for more cupboards frequently expressed. In a few instances complaints of rain coming into room through ventilators.

Dampness.—Only one complaint, which is receiving attention.

Outside Shed.—Demand for shed strong and unanimous.

IV

The cottages just dealt with, as we have already pointed out, may be taken as representative of the Garden City workman's cottage. They are pleasing in external appearance, and by means of ample space at the front and back, and because of the practice of building them in blocks of four and six, the maximum of sunlight and air is secured. The criticisms upon them made by the tenants would apply generally to Garden City cottage building. The question of the absence of a shed is a characteristic objec-

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tion to the new style. The effort to get every part of the building under one roof is no more successful with small cottages than it is with large houses. An outbuilding of some kind is an absolute necessity, and sooner or later the cottage has to be supplied with one. Mr. H. D. Pearsall, one of the original promoters of the Garden City, who has given much time to the cottage problem, has explained at the end of this book the aims of those who have been building, and what has been done in the way of cheapness and utility; so that it is unnecessary to go into every detail of the matter here.

V

The aim of the founders of the Garden City was not to provide for the very poorest class of the community. That is a problem of peculiar and special difficulty which was outside the original scope of the scheme. The problem of industrial housing, to deal with which Garden City was projected, is that of the workman who can afford to pay a fair rent, but is unable to get decent accommodation. It is well known, or at least it should be well known, that there are insufficient houses in this country for the sanitary housing of the people. "If," said Mr. William Thompson at the beginning of his valuable *Housing Handbook*, "every room, good and bad, occupied or unoccupied, in all the workmen's dwellings in the country be reckoned as existing accommodation, there are not enough of any sort to house the working population without unhealthy overcrowding."

The problem is not one which affects merely the poorest of the poor. It affects the great mass of workmen. And the Garden City, as a great attempt at constructive reform, set out to provide decent conditions for the average artisan. The lowest paid labour was, however, attracted to the town, was in some slight measure, perhaps, required by the industries of the town, and, once in the place, had to be provided for. It demanded housing. The very lowest rent at which it was possible to build was, if anything, too high for it. The result was that the towns and villages round about, in which a great deal of the housing was unsanitary and



WORKMEN'S COTTAGES AT RIDGE ROAD (GARDEN CITY TENANTS, LTD.)



WORKMEN'S COTTAGES AT RUSHBY MEAD (HOWARD COTTAGE SOCIETY LTD.)

Workmen's Cottages

condemned, attracted a proportion of the workers. The medical officer for the county in his annual reports has again and again drawn attention to the extent and consequences of the evil. "The oldest and cheapest houses will always find occupants; proper housing can only be secured for the poorest if the sanitary authorities insist on repair, or on the closing and demolition of the worst houses, while taking action against overcrowding. This alone can materially increase the demand for sanitary houses and enable builders and landlords to build."

It may be pointed out in passing that the proximity of the towns of Hitchin and Baldock to the new town has in this, as in other respects, been a very real disadvantage. The lower sanitary and hygienic standards of these two old places have competed with the effort to set up and maintain much higher standards in Garden City. When it is possible to get cottages in a back street in these towns for from two to three shillings a week it is not surprising that there is a big demand for them, and that many workers in the new town who have been accustomed to nothing better, or who are satisfied with or can afford nothing better, should live in them. It is also not surprising that speculators in these towns should attempt to meet that demand by employing poorly paid labour and inferior material in building new cottages, as unsightly and objectionable as anything to be seen in the worst towns. This does not, of course, apply to all the building in these towns, but to some of it. The fact is that Garden City is too close to these old towns. It should be ten miles away from them. The promoters of the next Garden City may bear this fact in mind.

VI

The competition between the good Garden City cottages and the cheap insanitary cottages of the neighbouring towns, or even the more sanitary but still unsatisfactory new speculative builders' cottages in these towns and villages, has had an influence on building in the town. It has encouraged an attempt to lower the hygienic standard of Letchworth housing, though happily without result, and it has intensified the demand for the cheapest building.

The Garden City

The cottage companies have attempted to meet this demand, but from the experience they have gained it is clear that private enterprise is not so well placed for this kind of building as the local authority.

The two essential requirements of this cheap building are cheap money and cheap land. At Garden City the land is available, but the cheapest money is that to which the local authority has access. A private person or public company, even when the latter is registered under the Industrial and Provident Societies Act, 1893, in order to qualify as a society of public utility, cannot obtain loans for cottage building from the Public Works Loan Board for more than two-thirds of the value of the property, for longer than forty years, and at a lower charge (including repayment of principal) than £4 7s. 2½d. per cent. The usual term is thirty years at the rate of £5 8s. 9d. per cent. A local authority can secure the full amount of the value of the property on loan for at least sixty years (the maximum is eighty) at 4 per cent. per annum, including repayment of principal. The private person or company has to provide at least one-third of the capital cost of the property (in practice it works out at a larger proportion, because of the low valuation of the property by the Office of Works, which is the basis accepted by the Public Works Loan Commissioners¹) out of his or its own resources, which brings the rate of *interest only* chargeable on the property (excluding the annual repayments of loan, which have to be met out of capital) to from 4 to 5 per cent. The local authority has therefore a clear advantage in the matter of the annual charges, while at the same time it has no capital to provide because the cottages

¹ H.M. Office of Works, which has to report on the plans and make the valuation of the property before loans are agreed to by the commissioners, arrives at its valuation by taking 16½ years' purchase of the net rentals of the property, after the deduction of all outgoings. This inflicts a distinct hardship on the builders of cottages at Garden City, who, as a rule, fix their rents to show a return of from 4 to 5 per cent. It is a direct inducement to rack-renting; for when cottages are to be erected at a cost of, say, £5000 and the Office of Works' valuation is £4000 or less, due to the low rents proposed to be charged by the public-spirited landlord, the landlord is penalised for his public spirit. In some cases, where it has been possible to produce evidence that cottages of an equal or inferior standard are actually let at rents sometimes 25 per cent. greater than those proposed to be charged by the landlord in question, the Office of Works has been persuaded to increase the amount of its valuation; but it would seem that the principles on which these valuations are made stand in great need of revision.

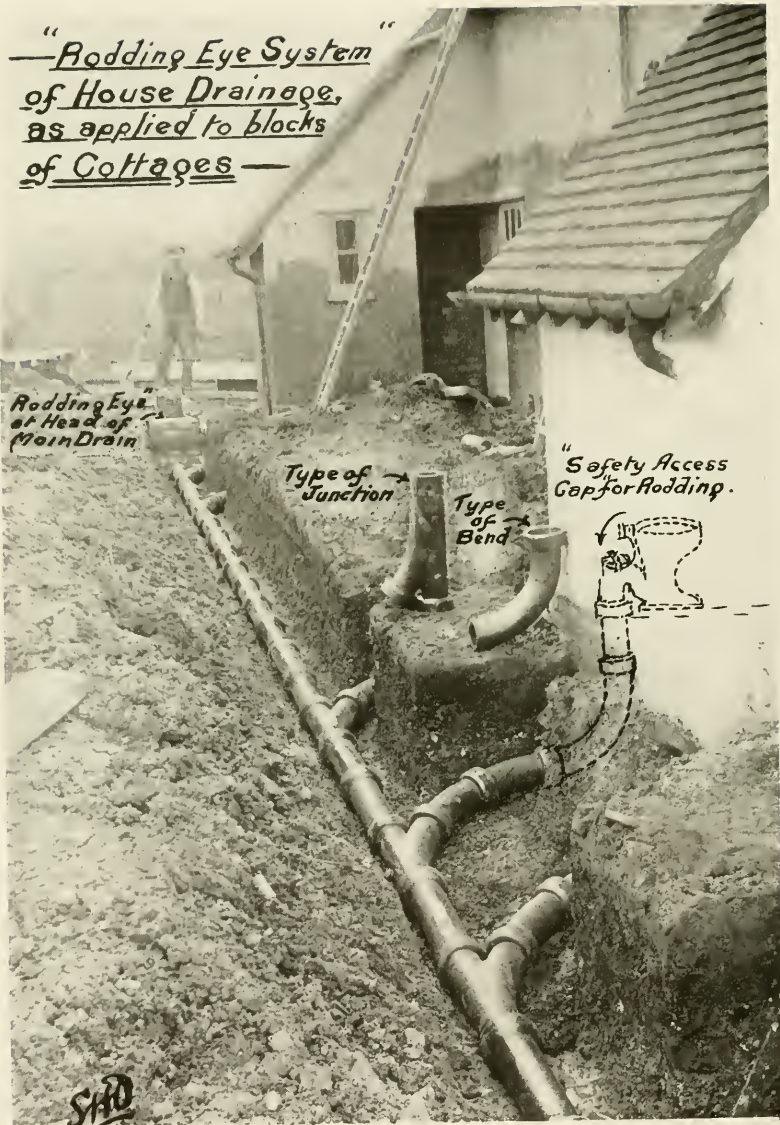
"Rodding Eye System"
of House Drainage,
as applied to blocks
of Cottages —

Rodding Eye
at Head of
Main Drain

Type of
Junction

Type of
Bend

"Safety Access
Gap for Rodding."



THE RODDING EYE SYSTEM OF HOUSE DRAINAGE

Workmen's Cottages

are being purchased for it by the tenants in the rent. Under these circumstances it is obviously the duty of the local authority, on both economic and public grounds, to meet the demand of the lowest paid labourer for cheap and decent housing. The cheap money to which it has access definitely removes the provision of the very cheapest housing from the sphere of private speculation or private charity to that of public duty, and when the fulfilment of that duty can be undertaken without any charge falling upon the rates there is no excuse for a local authority which fails to meet its obligations, or for a community which neglects to see that its poorer members are properly housed.¹

At the Garden City the local authority with power to build is the Hitchin Rural District Council, and, urged by the parish council, four cottages were built in 1912. The particulars of these cottages are given hereunder, by courtesy of the clerk to the council.

Land was leased from the Garden City Company on a 999 years' lease, at an annual rent of £5 17s. 10d. revisable every 99 years. The area is 1616 square yards. The cottages were designed by the surveyor to the council. The total cost was £560, and a loan of that amount was received from the Public Works Loan Board. The cottages are let at a rental of 4s. 6d. per week each, including rates. They each contain a living-room, scullery, and three bedrooms. The following is the annual revenue account :—

	£	s.	d.	£	s.	d.
Rent received from four cottages at 4s. 6d. per week each				46	16	0
Less—						
Public Works Loan Board (interest and repayment of principal)	22	6	0			
Ground Rent	5	17	10			
Collection (2½ per cent.)	1	3	4			
Repairs	6	0	0			
Rates, Taxes, and Water	6	13	8			
Insurance		9	0			
Allowance for empties and other charges	1	10	0			
				<u>43</u>	<u>19</u>	<u>10</u>
Balance in favour of the council	<u>£2</u>	<u>16</u>	<u>2</u>			

¹ It may be pointed out that by the provisions of the Act of 1909 loans advanced to public authorities for housing purposes are secured on the property erected, and the money so borrowed is not reckoned as part of the debt of the authority for the purposes of the limitation on borrowing under the Public Health Act, 1875.

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VII

When the good cottage at a low rent is secured, it is then necessary to see that it is well used. "It is not sufficient to build good houses," says the official handbook of the Stuttgart Housing Bureau, "it is equally important to see that good houses are kept in a healthy condition." Such a matter is doubtless easy in Germany, where the poor are disciplined and accustomed to many regulations. It is not easy in England; but the need of it is great. We cannot take our models in this matter from Germany, because the traditions and habits of the people of this country are different from what are found abroad; but if the new housing is to be completely effective, then its economies must be well employed.

At Garden City an attempt was made by one of the cottage companies to secure the good use of the cottages by offering a prize of a week's rent to the householder's wife who kept the cottage in decent condition, clean, well ventilated, with the signs of some care for the property. Lady judges inspected the cottages after notice had been given to the tenants, and marks were awarded under various heads, tenants securing a certain percentage of marks receiving the prize. The attempt was not, on the whole, successful. Many good tenants did not care to have their homes inspected, and most of the bad ones naturally were reluctant. The inspection, therefore, did not achieve the desired object. A good plan, which does not involve intrusion upon the privacy of the individual, is to award tenants who pay their rent regularly a small consideration at the end of the year. It will be found, as a general rule, that tenants who pay regularly are good tenants in other ways. Sickness and unemployment have to be taken into account, but the tenant who uses the home well usually pays well. Then, men whose employment is held on insecure tenure, requiring them to move from place to place, can hardly be expected to take much interest in the houses they occupy. Steady employment has much to do with the maintenance of the good home.

Another experiment tried by the cottage company already referred to was to put the collection of a proportion of its rents into the hands

Workmen's Cottages

of the Guild of Help, a local organisation for the purpose of assisting the poor. This experiment has worked fairly well, but its adoption on a large scale is hardly likely. The first interest of any collector of rents, whether he be a semi-philanthropic helper of the Guild of Help or an ordinary collector, is to get the rent, whatever happens. Otherwise he loses his job. The rent collector has, however, many opportunities of helping the tenant, and of encouraging the good use of the property, if the time allowed him for his work permits of the use of such opportunities.

The kind of workmen's housing found in the Garden City provides an opportunity for the house to become a home. It supplies the bare physical conditions. Education in the school, leisure for the worker, and an improvement in economic conditions are some of the means whereby the full benefits of good housing, the chief of which is a wholesome family life, will be secured. What Garden City does is, after all, but to show the way; it does not go the whole way. There are many improvements yet to be effected, as every one will admit.

CHAPTER XIII

THE CHILDREN

“Where there are children, there is the golden age.”—*Novalis*.

I

IF it could be said that the Garden City had failed in everything else, it would still be justified by its children. They alone make the place victoriously successful. Without any special provision for them beyond what might be found in many other towns, the mere improvement in physical conditions, the open air, the good homes, and the schools produce such a marked effect that in no other town will healthier children be found, and in most towns, alas ! they are not half as healthy.

The conditions under which the early years of life are lived determine to a considerable extent the physical, mental, and moral health of men. The evils that are suffered in youth are not shaken off with age. If its beginning be healthy the whole course of man's life is benefited. Healthy environment is most quickly appreciated by the child, just as the inevitably harmful conditions of the town are first seen in the deterioration of the young. There is a “mean physical standard which is the inheritance of the people as a whole,” and to restore that standard to the classes in which it has declined “all that is required is to improve the standard of living, and in one or two generations the ground that has been lost will be recovered.”¹ Commencing with the child we can renew the physical qualities of the race. By providing good conditions for the child we are laying the foundations of a new society and of a new national greatness.

¹ Report of the Inter-Departmental Committee on Physical Deterioration, 1904, vol. i. p. 8.



NORTON ROAD COUNTY SCHOOL: A GEOLOGICAL LESSON ON ICKNIELD WAY



NORTON ROAD COUNTY SCHOOL: A LESSON AT THE ROMAN CAMP

The Children

II

There is, says Dr. Arthur Newsholme, in his *Vital Statistics*, a "gain from being born in a healthy district." Let us see what that gain amounts to. There were 872,767 children born in England and Wales in 1912, and of these 82,939 died in their first year. That gives a rate of 95 for every 1000 births, which is the lowest infantile mortality rate on record. In the Garden City the rate was 50.6.¹ If the rate throughout the country had been as low as at Garden City, nearly half the children who died last year would have survived. This rate of 95 per 1000 births is, however, for the whole country. If we take the towns we shall find it much higher. The full details are not available at the time of writing, but in the 95 great towns in each of which the population at the census of 1911 exceeded 50,000 the rate was 101; in the 146 smaller towns with populations ranging between 20,000 and 50,000 at the census of 1911 it was 98. In the rest of the country the rate was 86.²

We may say then that, if the conditions in the homes of the people in the great towns had been as good as they are in Garden City, 499 out of every 1000 children who died would have been saved; in the small towns 493.9, and in the rural districts 411.6 in every 1000 of the children who perished in one year would not have died if the Garden City home had been general. It is to be remembered that this is in a year with the lowest rate on record; no less than 35 per 1000 below the rate in 1911 and 30 per 1000 below the average in the ten years 1902 to 1911. In 1911 the rate in Garden City was 53 as against 130 for the country. "The health conditions under which the mother lives have an undoubted influence on the vitality of her progeny and on the occurrence of premature birth" is the conclusion of Dr. Arthur Newsholme in the book from which quotation has already been made. "Surely," says Dr. Leslie Mackenzie, "it is our duty to provide an environment which is not certain to kill."

¹ The birth-rate was 22.9.

² The Registrar-General's *Annual Summary of Marriages, Births, and Deaths for 1912*. June 1913, pp. v. and vi.

The Garden City

III

The figures already given are sufficiently startling, but the matter does not stop there. It is not a mere question of the difference in the number of deaths among infants under twelve months, but of the general health of children who survive that age. Dr. Arthur Newsholme says that where the number of deaths under one year is greatest, the number of deaths of all children up to ten years of age is also greatest. The infantile mortality tables, "as usual," declares the Registrar-General in his last annual report (for the year 1910), "show considerable excess of urban mortality, and great increase of this excess as age advances. . . . It would seem that at birth the urban infant is almost as healthy as the rural, but that the adverse post-natal influences of town life soon diminish its relative chances of survival." The author of *The Future of England* points out that ". . . a high infantile mortality rate inevitably connotes a far higher infantile deterioration rate." It is not, therefore, a simple question of the balance of lives saved, but of the maintenance of a higher quality of physique among children of all ages.

There are 200,000 children in the schools of London suffering from defects which are largely preventable: adenoids, defective vision, hearing, teeth, etc. Says the county medical officer of health for Hertfordshire in his annual report: "The health of anæmic and ill-developed children in the schools, after arrival in Letchworth, is noted to be greatly improved; and adenoids and other throat affections are notably diminished."

In a report by Dr. W. L. Mackenzie and Captain Foster to the Scottish Education Department in 1907 on the physical condition of children attending primary and high-grade schools in Glasgow it is said: "It cannot be an accident that boys in one-roomed houses should be 11.7 lbs. lighter on an average than boys from four-roomed houses, and 4.7 inches smaller. . . . Girls, 14 lbs. lighter and 5.3 inches shorter." And although complete figures are not yet available of the measurements of Garden City children, yet the conclusions come to by Sir W. H. Lever with regard to Port

The Children

Sunlight children may be taken to hold good of Letchworth : " Garden City life at Port Sunlight discloses the fact that the sons of our artisans and labouring population of Port Sunlight produce superior height and weights at equal ages than are produced in higher grade schools amongst the children of leading and wealthy citizens of Liverpool."

IV

If the benefits of the Garden City to children are so great, it is because the town gives an opportunity to the home. " The improved treatment of the children," says the Hon. George Peel in *The Future of England*, " depends almost entirely upon the improved condition of their homes." Instead of fifty to eighty houses to the acre, in Garden City we have a maximum of twelve ; instead of insanitary, inconvenient, and sunless dwellings, we have cottages with gardens ; instead of crowded streets to play in, the children have the fields. In Garden City the home gets a chance of fulfilling its highest functions, of becoming a centre of refreshment, education and social life. All that is squalid and mean is abolished, and the housewife is encouraged to take pride in her home and to get the best out of it. " In this country," says Mr. Horsfall, " we have many houses, the bad construction of which makes them unwholesome, and a larger number which, in themselves potentially wholesome, are made unwholesome by their surroundings." The good homes of Garden City are placed in good surroundings, and in giving a chance to the home we are giving a chance to the child. The home is, indeed, of importance because of the children who live in it ; the greater part of their lives is spent under its influence ; the training they get there and the habits they form affect them so long as they live. In Garden City there are no slums ; there are, therefore, no slum children. There are none of those conditions which reduce the vitality of the child and make town life a curse to the race.¹

¹ The writer was told by a Garden City resident of a woman whom he saw in her garden with two young children, one a baby in arms. He observed how much finer than the elder child the baby was, and the mother said, " Yes, baby was born in Garden City, the other was born in London."

The Garden City

V

After the home, the school. The elementary schools of Garden City are, indeed, as near being models of what schools should be as education authorities will let them. Before the town was founded education was one of the matters which the Garden City Association, recognising that the Garden City would be different from all other towns, considered at great length. The late Bishop of Hereford was chairman of the first committee which met on the subject, and Dr. F. W. Foat and Mr. John Russell were subsequent chairmen. A scheme of education was prepared by Professor Findlay of Manchester, and all kinds of proposals were debated. The committee, however, like most of the pioneers, thought of Garden City as so much superior to the ordinary conditions of twentieth-century life that they looked for greater perfection than was even remotely possible. They aimed at ideal schools and ideal educational facilities; they thought that the Garden City would give them an opportunity of putting into practice the excellent educational principles that many of them had. But they were disappointed. They found, when the time came to take steps to carry out their proposals, that the county authorities and the Board of Education, while expressing sympathy, would go very little further. They made a valiant attempt to start their school by opening a public elementary school in temporary premises in November 1905. There they endeavoured to start a school for all Garden City children, with smaller classes, better teachers, and a more complete system of co-education than are found in most schools, conducted with such efficiency that "all classes of the community might send their children to be educated together during the early years of school life, and that all children of exceptional ability, of whatever class, might have an opportunity of being prepared for higher education." It was "non-provided" and "non-sectarian," and was probably one of the first of its kind in England. It was "non-provided" (that is to say, the building was provided from private sources, not by the local education authority, though that authority was responsible for the maintenance of the school) in order that



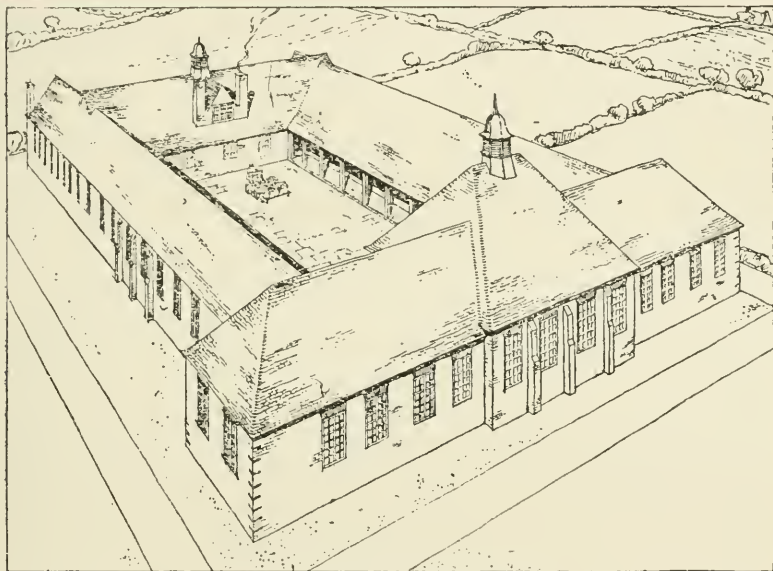
THE GARDENING CLASS AT A GARDEN CITY SCHOOL



THE QUADRANGLE AT A GARDEN CITY COUNTY ELEMENTARY SCHOOL

The Children

the committee might have control of the school management by appointing four out of the six managers and so carry out their ideas. To do this of course they needed money over and above what the education authority would allow. With adequate funds they could have carried out their full programme, but unfortunately those funds were not forthcoming. A voluntary rate of 6d. in the £ was levied on the residents, appeals were made by public



The County School, Norton Road.

subscription, and the Garden City Company made a handsome donation, but the result was disappointing to the committee, and at last it dissolved, and the school was handed over to the county council to become an ordinary county school.

The committee, however, did some good work while it existed. It appointed the headmaster of the first school, and was responsible in getting the Garden City Company to make a gift of two acres of land to the county council for a school site; it was in consequence enabled to exert some control over the preparation of the plans for the first school building. The first school has many points of

The Garden City

interest. The size of the class-rooms does not exceed 400 square feet of floor area. This, on the usual basis allowed by the Board of Education, limits the maximum number of children in each room to forty. On this basis the school has places for 680 children. The small class-rooms reduce the number of children in each class, and this is the chief gain, educationally, which the school claims. It was the hope of those who planned the school that rather more floor space would be allowed per child than the minimum of the authorities, thus limiting the classes to thirty-two, but the demands upon the school accommodation have been so pressing that it has not, so far, been found possible to do this. Another point of interest in the building is that all the rooms, including the central hall, are in direct communication with the open air to a degree not attained in the ordinary type of school. Where the central hall is placed in the middle, and the class-rooms cluster round it on all sides, the vitiated air from the one is constantly passing into the others. In the Garden City school the class-rooms are built around a central court, or open quadrangle, which measures 95 feet by 42 feet. On two sides of this quadrangle there runs a covered way or cloister, giving shelter to those passing along, at the same time leaving the class-rooms in contact with the open air. The quadrangle makes an ideal open-air class-room for use in hot weather, and a clean open-air playground into which the classes can be turned for short breaks, without bringing back mud and dirt into the school, or wasting the time necessary for changing shoes.

Access to the central hall is obtained from all the class-rooms without disturbing the work in other rooms. The central hall can thus be used for many purposes for which it would hardly be available in a school planned in the ordinary way.

The whole of the class-rooms are planned so that the children sit with the light to their left hands.

The elevation is quite simple.

The usual subjects are taught in the school, though in a rather more intelligent way (the teachers maintain) than usual.

A special feature is made of gardening, singing, and dancing. There are forty-two garden plots shared by both boys and girls, and fowls and bees are kept. Morris and country dances are

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taught; the May Queen, at the annual public festival, is chosen by ballot by the boys and girls in the upper classes. There is a system of scholarships, subscribed mainly by business firms in the town, to encourage children to stay at school until they are fifteen. The school was one of the first in the country to have a school nurse, and a school dental scheme is at work, supported by voluntary contributions.

A second school has been opened recently, with capacity for 508 children, and a third school is about to be built.

VI

The private schools of Garden City are many and excellent. They all make a feature of open-air lessons, physical culture, gardening, botany, and games. Letchworth School, of which Mr. J. H. N. Stephenson, M.A., Oxon., is master, has a fine range of buildings built in 1909. The school was founded in temporary premises in 1905, and was the first school of any description to be opened in the town. It was in the first place an experiment in the co-ordination of the various stages of higher-grade education, beginning with a kindergarten and working through to the final preparation for various professions and callings or for a university career. It was believed that such co-ordination would make a wider range of studies possible and facilitate progress.

It was further an experiment in co-education, from a conviction that the close association of the sexes from early years would be of great and lasting benefit to both.

Again, it was realised that the conventional system of marks and prizes has notoriously failed to produce, among boys especially, a real keenness to learn; it was hoped that a more effective stimulus would be found in more rational methods of teaching by gradation of subjects, and by keeping within reasonable limits the demands made on the mental powers of pupils.

In these and other respects the school has more than justified the hopes of its promoters, and its high moral tone, the atmosphere of mental alertness, and the actual attainments of those who have

The Garden City

grown up in it, go to confirm the principles recognised by the school.

There are now fifty-three pupils in all, ranging in age from five to sixteen years, of whom three-quarters are boys. Its present premises provide accommodation for boarders, as well as a large workshop, well-equipped laboratory, ample playing fields, fives court, &c.

The Modern School for Girls, conducted by Miss Cartwright, M.A., gives its pupils the opportunity of an all-round development, both on the physical and intellectual sides, at the same time teaching them practical housewifery, needlework, physiology, gardening, and other subjects intimately bound up with home life.

There are also the Wilbury School, the Leys High School, and other smaller schools and classes.

VII

If, without taking upon himself too much of the mantle of the prophet, the writer may venture a word upon the future of Garden City, he would say that when the town has grown to near its full size, and some of the economic benefits which are inevitable to its growth are being enjoyed, it will be possible to find the money to make Garden City education and everything in connection with its schools better than anything we yet have seen in the towns of this country. The Englishman grudges the money spent upon education; reforms in our schools are long overdue because of the indifference of the average man to educational matters and his reluctance to find the money they demand. We have not yet learnt that the money spent upon education may be well invested. But in Garden City it will be possible with a more enlightened public opinion to do what men will not do elsewhere. To the physical advantages of the place there may be added those facilities for the development of the mind which belong to the highest civilisation. The child may be given such opportunities in Garden City that the schools may make its men famous. The one thing that is certain is that the town will, in the end, have the funds to do it.



LETCHWORTH SCHOOL



AT THE MAY FESTIVAL

The Children

VIII

It is said of Hertfordshire, in a book of the seventeenth century, that "the air is clear, sweet, and very wholesome, which probably in old time might invite . . . divers Kings since the time of the Conquest to breed and educate their Children here." And though that excellent custom is not now followed, yet the county maintains its famous character as one of the healthiest in the kingdom, and to-day, with the Garden City in it, it has a town where not kings only might breed and educate their children under so favourable conditions as they are not likely to find elsewhere, but where all sorts of men, poor as well as rich, may do the like. The Garden City is a town for children, for their homes and their education. Everything in it that makes it attractive and delightful to the adult is doubly delightful to the child. It is the one town of England in which all that goes to make child life healthy, happy, and wise is the very basis of the place.

CHAPTER XIV

HEALTH IN THE GARDEN CITY

"The healthy individual man . . . needs a healthy community."—DR. W. LESLIE MACKENZIE, *Health and Disease*.

I

THE last chapter showed Garden City to be a town good for children; it does not need much further argument to show that such a town must be good for every one. If health conditions be so favourable that the lives of infants are saved, it is easy to see that those conditions will be no less favourable to grown men and women. The infantile mortality rate, says the Registrar-General, "has always been regarded as a valuable test of salubrity." And it is on the fact that that rate in Garden City is less than half that in the large towns, and nearly half that in the whole country, that the claim of Garden City to be the healthiest town in England is based. The general death-rate for the town provides a no less startling comparison with the rates in other places :

DEATHS PER THOUSAND POPULATION LIVING FOR THE YEAR 1912.

Garden City	8.0
Hitchin Rural District	9.0
England and Wales	13.0
95 great towns (including London)	14.1
146 smaller towns	12.6
England and Wales, less the 241 towns	11.9

The death-rate for 1912, says the Registrar-General, is lower than the rate in any year on record. The Garden City rate in 1909 was 5.2 ; in 1910, 4.5 ; and in 1911, 8.4.

It may be as well to point out that the figures for 1912 are the corrected, not the crude rates ; the crude rate for Garden City, before making allowance for the difference of sex and age-constitution, is 7.5. The detailed census returns are not yet published, but the county medical officer in his report for 1912¹ says that he has

¹ Report on the Public Health of Hertfordshire for the Year 1912. June 1913, p. 157.

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received from the Census Office the factor for the correction of the death-rate, which for Garden City is the high one of 1.0683. It is probable that the vital statistics for Garden City at present rather understate the health of the town. Not only is the estimated population on which the death-rate is worked out considerably less than the estimate of the Garden City Company, but a large proportion of the population is only in process of settling down in the town, and the full health benefits of the place are not yet completely enjoyed. It will be some years before the Garden City figures are comparable with the figures for established towns. In the meantime it is satisfactory to know that so early in the history of the town its effect upon those who have recently come out of the old towns is so marked. Its population comprises a good average of working-class, middle-class, and professional families. There are many young people and young families, and more than half the population is industrial; there are many retired persons who have come to the place for its economies, and many others who have come on account of their health. If all the factors are taken into account there is no reason to suppose that the population consists of specially picked or advantageous lives, but is, on the whole, representative of the community in general.

It is unnecessary to make any further comment on the figures already given; they speak most eloquently for themselves. They offer, after making all due allowances, most emphatic proof of the superiority of the Garden City in matters of health; and just as the gradually declining death-rate in the country since 1865 shows a great saving of life, so the Garden City shows how, by avoiding the evils of old towns, it is possible to reduce the rate still further and add to the life and happiness of men.

II

The improvement in the general health of the country shown by the remarkable decline in the death-rate, amounting to a difference of no less than 8.3 per 1000 between 1861 and 1912, is due very largely to the health movement begun by Edwin Chadwick and the Health

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of Towns Association in the thirties of last century. Better drainage and a better water supply have been the chief outcome of that movement, and, to some extent, better housing also. But the improvement of housing has lagged far behind all these other reforms, and to-day, in town and country, the housing of the people is still waiting to be dealt with in some thorough and efficient manner. Bad houses and insufficient houses are the evils with which we are still faced. But the very greatest evil is the evil of the town itself. Mr. T. C. Horsfall says, "the great diminution in the death-rates in all civilised countries tends to make us all under-estimate the amount of harm which is being done to the human race by life in cities." The "deprivation of sunlight and the lessening of the vivifying qualities of the air" (to quote from the Report on Physical Deterioration, in 1904), from which all who live and work in cities suffer, reduces physical energy and lowers the quality of physical life. In England we have no adequate statistics to show how the health of townsmen and countrymen compare, a matter referred to at length by the committee in the report just mentioned. In Germany, however, such statistics are available. Mr. Horsfall gives them as follows:—"In 1910 the proportion of the young men who had reached the age for military service who were physically fit to serve was, for the whole of Germany, 53 per cent.; for towns with more than 50,000 inhabitants, 44.8 per cent.; and for Berlin only 27.6 per cent. In the healthy country districts the proportion was over 80 per cent." We may be fairly certain that much the same differences exist in this country. Town life as we have known it in the past has been inevitably attended by consequences prejudicial to health, and in spite of great improvements that have been made it is still productive of physical deterioration. Nearly half our population lives in the great towns of over 50,000 inhabitants, and for every person who lives in a rural district or a town of less than 10,000, 2.3 live in the large towns. Fog and smoke, among other causes, produce evil results. From October 1 to 19, 1912 (a period of fog), the death-rate in London rose from 12.2 to 16.8, nearly 40 per cent. In Glasgow, in 1909, two periods of smoky fog caused a rise in the death-rate from 18 to 25 per 1000. London loses 72 per cent. of its winter sunshine because of smoke.



Garden City Pastoral

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It is of these great towns, in which men and women suffer and die because light and air are denied them, that we make our boast when we think of the prosperity and wealth of our civilisation. "If we look at the facts," says Dr. Arthur Shadwell in his *Industrial Efficiency*, "we shall see that in every country nothing excites more popular pride and satisfaction than contemplating the growth of cities and the aggregation of people in them." And yet, he wonders, "in spite of the pride inspired by their magnitude, they have a bad name and are shunned." Is there, indeed, any reason for wonder?

III

The Garden City carries on the improvement in sanitary conditions by improving town life. Fogs, smoke, slums, crowded areas, and bad houses are not found there. Its clean atmosphere and rural surroundings make town life as healthy as country life. In the Garden City factories the workers pursue their vocations under conditions often as perfect as can be devised by modern industry,¹ and their homes are not in dark courts or distant and dismal suburbs, but in pleasant roads and surrounded by plenty of space. The principles observed in the development of the town, the restriction of its size, the limitation of the number of houses to each acre, and the regulations as to the size of rooms and gardens, are the means by which Garden City brings back health to the town. It abolishes daily travelling for the worker, it increases his leisure, and it gives to him an opportunity to enjoy open-air pursuits. The Garden City brings the country into the town, and makes all the healthful and sweet qualities of country life part of the life of the town. All civilised nations are becoming more and more nations of townsmen, and the Garden City shows for the first time the way in which the towns, instead of draining the vitality of the race, may maintain it.

¹ "Any who wish to see healthy workers, working in the brightest, healthiest, airiest, and sunniest of factories should visit Mr. Dent's or Messrs. W. H. Smith & Son's bookbinding works, or the Lacre car factory at Letchworth on a fine sunny day. There should be a great future for the employers and for the nation whose workers are employed under such conditions."—The County Medical Officer of Health in his *Report on the Public Health of Hertfordshire for 1912*, p. 172.

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IV

In addition to the reform of town life which Garden City directly attempts, there are many auxiliary means of increasing health which Garden City is particularly well placed for putting into practice, and one of the chief of these is the provision of a central milk supply. Milk is so important an article of food at the present day; it is so easily contaminated and becomes so quickly a vehicle of disease, that the existence of a supply of pure milk to a community is only second in importance to the existence of a supply of good water. Water and drainage are recognised as prime concerns of every town, and housing will soon receive equal consideration. When these three things are dealt with it is only a question of time before attention is directed to milk. Few people realise how difficult it is to get good milk, and many who are careful in other things are careless in this. Yet the importance of an hygienic method of milk supply is so great that it can hardly be exaggerated. Health authorities are beginning to perceive how much the community is affected by the haphazard and insanitary manner in which the dairy business is conducted throughout the country, and the need of thorough reform and of more drastic legislation is universally admitted.

In Garden City an unusually favourable opportunity arises of dealing with the problem. Here the farms that supply the town are in the ownership of the chief town authority, the Garden City Company. Recognising the necessity of a sufficient milk supply, the company has in the last few years made a number of new dairy farms and has encouraged in every possible way, by additions to home-steads and by improved shippens, as well as by improving permanent pasture and increasing its area, to get adequate milk facilities for the town. The existing dairy farms already produce practically all the milk consumed in the town, and little or none comes in from outside; as the demand increases there is plenty of room to extend the means of supply. The production of the milk is, of course, in the hands of the separate tenants, under inspection by the sanitary

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authority ; and distribution is, as elsewhere, in the hands of dealers. The reform which the Garden City Company has the opportunity to initiate, while the trade is yet in its infancy, is that of organising the milk supply for the whole town on an hygienic basis. In other towns legislation is needed to make such a step possible ; but in Garden City the matter is entirely in the hands of the local community and the company. Without serious disturbance of vested interests, and without interfering in any way with present or future farm tenants, it would be possible for the company to create a central dairy for the reception and distribution of milk, by means of which the industry would be put on a better economic basis and the purity of the supply guaranteed. By the establishment of a central organisation, proper supervision could be exercised over milk production, over the conditions of cows and cowsheds, and direct encouragement could be given to the adoption of modern and hygienic methods.

The Garden City Company could carry this out, because it could provide a properly equipped organisation and would be able to secure the efficient management which such a scheme demands for its success. It could do it because it is the landlord, and because it could provide facilities for its tenants to increase their business. It would eliminate the dealer who is one of the most unsatisfactory factors in the present state of the industry, producing considerable economic waste through overlapping, and the cause of much impurity through bad storage and general ignorance and the use of unscientific methods. It would be a valuable means of co-operation among the farmers. It would free them from the economic disability which they are under with regard to the disposal of their produce. Many of the farmers at Garden City began by retailing the milk themselves ; but they found that, for one reason or another, they could not make the business pay, and most of them retired from it after a while. A well-conducted and reliable market for the sale of the milk they produce would be of assistance to them and would aid in the agricultural development of the rural area of the town.

The immense advantage that a well-controlled and hygienic milk supply would be to the town is evident. It would make it more

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attractive from a residential point of view and would add immeasurably to its attractiveness to people with young children.

V

In another matter bearing upon the health of the town the Garden City Company has acted wisely by refusing to allow private slaughter-houses on the estate, thus leaving the way clear for the establishment of a central abattoir. The provision of a public slaughter-house, in conjunction with the local sanitary authority, would be a means of ensuring a sound meat-supply, a matter of vital importance to every community. The county medical officer has been active in urging the authorities to take action "before vested interests have secured an impregnable position." In view of the number of private slaughter-houses in the neighbouring towns, and of the unsatisfactory condition of many of them, it is desirable that Mr. Fremantle's warning should not be neglected. In this, as in the case of the milk-supply, the Garden City, because of the peculiar circumstances in which it is placed, can act with more directness than is possible in other towns, and is better able to control those elements which affect its health and well-being.

CHAPTER XV

SOME QUESTIONS OF GARDEN CITY FINANCE

"FALSTAFF: What money is in my purse?"—*The Second Part of King Henry IV.*

I

THE finances of the Garden City provide material for a particularly interesting study. The amount of money already involved in the undertaking, by all parties concerned, considerably exceeds three million pounds, with the spending of some millions more in prospect, but the peculiar interest which attaches to the subject is not so much on account of the large amount involved as in the complexity of the entire scheme, the variety of the interests affected, and the unique character of the town. In this chapter, however, attention will be confined to that aspect of its financial side which strictly belongs to it as a Garden City; for an attempt to deal with the finances of all the contributory factors to the scheme would not only be intricate and lengthy, but confusing and out of place.

II

The First Garden City, Ltd., which is the owner of the freehold of the land on which the town is built, as well as the organisation which has developed the place and provided its public services, is a joint-stock company registered under the Companies Acts. It is governed by a memorandum of association, which is practically unalterable, and by articles of association, which may be altered at any time by its members, and contain the regulations for the conduct of the company's affairs.

The whole of the money for the purchase of the land and the development of the town has been acquired from private investors and ordinary commercial sources. No funds have been provided

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by the state. Although efforts have been made from time to time to secure government money and some part of the large sums which have been occasionally bequeathed for philanthropic housing purposes, those efforts have not met with success. An account of the constitution of the company and the organisation of its business as well as some description of the various sources from which capital has been obtained provide subjects for treatment in the appendix to this book and need not detain us here.

The authorised share capital of the Garden City Company is £300,000, divided into 3000 shares of £1 each and 59,400 shares of £5 each. The shares have been, and still are, offered for public subscription. The amount of the capital seems small when it is considered that the company was formed to build an entirely new town. But two things have to be remembered in this connection. One is the pretty obvious thing that it is possible for a joint-stock company to increase the amount of its nominal capital without difficulty at any time. There was consequently no object in the directors paying at the beginning large sums in stamp duty on more capital than they expected to get subscribed, or for which they had any immediate use. The other point is that the company did not propose to undertake the whole of the building itself. That a capital of £300,000 is inadequate for carrying out the entire enterprise is plain; had the company been floated through ordinary financial channels, by the ordinary company promoter, its capital would have run into millions.

As the operations of the company were not of a speculative nature, the methods of the ordinary promoter were out of place. The possible return on the capital was limited by the memorandum of association, and with such a limitation the undertaking could never become speculative. The clauses in the memorandum are :

(d) To pay upon the ordinary shares or stock of the company a cumulative dividend not exceeding 5 per centum per annum, and to apply any balance of profit after such payment as aforesaid to any purpose which the company or its directors may deem for the benefit directly or indirectly of the town or its inhabitants.

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(o) Upon any winding-up or distribution of the assets of the company, except for the purpose of re-construction, to apply for the benefit of the town or its inhabitants any balance remaining after

(1) Repayment of the paid-up capital of the company.

(2) Any sum required to make up a cumulative dividend of 5 per centum per annum thereon.

(3) A bonus not exceeding 10 per centum upon the amount paid up on the ordinary shares.

The limitation of the dividend was adopted as a means of ensuring the faithful carrying out of the company's primary object. With no limitation to the dividend there would exist a great temptation for the shareholders to exploit the new town to the fullest possible extent, and as time went on and the property increased in value the proprietors might be very reluctant to part with a security yielding them the handsome profits that Garden City is bound to make. The directors of the company, and the great majority of the shareholders, being public-spirited men who had embarked upon the undertaking with the idea of performing a public service, did not wish to secure to themselves or their successors the full advantages to be derived from the scheme. Their intention was to develop the town in the interests of its future inhabitants, and to secure to those inhabitants, after the payment of a reasonable interest on the money expended, the results of the prosperity of the place.

It is probable that, when the state comes to realise its obligation to assist such undertakings as the Garden City with grants of public money, a limitation of dividend will be demanded as one of the conditions on which grants will be given.¹

From the beginning of its career the company was severely handicapped by the absence of adequate share capital and by the necessity to borrow large sums on mortgage. To this shortness of capital many of the defects in the building of the town may be traced, and in justice to its promoters and to the Garden City itself the effect of the insufficient financial support from the public must be borne

¹ It is worthy of note that the Public Works Loan Board which, under the Housing of the Working Classes Act, 1890, advances money for building workmen's cottages, offers more favourable terms of loan to companies limiting their dividends to 5 per cent.

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in mind. Had money been readily forthcoming for the scheme in the early days it is possible that the town would have to-day greater architectural consistency and would be far nearer completion; the Cheap Cottages Exhibition and other unfavourable incidents in its growth would have been avoided or their ill effects minimised. If the capital first offered for subscription had been quickly taken up and had the directors been in a position to pay off the original mortgages on the land, it is certain that the whole policy of the company would have changed; the nominal capital would have been increased, and instead of leaving the actual building to private persons and companies the Garden City Company itself would have erected many houses, cottages, and perhaps factories. That it was never in a position to do so is a matter for some regret. At the same time, however, it must be pointed out that the restriction of its funds has no doubt tended to greater economy in expenditure than might have been the case had plenty of money been available. With a large bank balance behind them the directors might have been tempted to indulge in experiments which would have cost them dear. We do not need to go far for examples of the ease with which large sums of money may be squandered. In an undertaking so great as that of building a new city, the inexperience of the promoters and the novelty of the scheme would have inevitably resulted in considerable waste had the means allowed of it. As it is, however, the company has never had more money than it has required for its immediate purposes.

III

The fifteen estates which make up the area of the Garden City were purchased in 1903 for £155,587. There were three villages on the land with a total population of about 400. The buildings on the property, mainly farm buildings and cottages, were estimated to be worth £63,656. In addition there was much valuable timber. The buildings, when purchased, were in a bad state of repair, and considerable sums have been spent from time to time to bring them up to a decent standard. Farm houses and buildings, a few cottages, and, in certain cases, one or two factories have been erected by the

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company, and further purchases of land have been made. The most important of these purchases took place at the end of 1912, when 748 acres to the south of the estate were secured. The amount spent by the company on the land and buildings, including additions and improvements, and the redemption of land tax, but excluding the purchase of the 748 acres, which was not actually effected until after the date of the last accounts, together with the expenditure on the construction of highways, the sewerage scheme, open spaces, and general development, and the provision of gas, water, and electrical works, was at September 30, 1912, £347,389.

IV

As a result of this expenditure the nucleus of a town was formed ; houses, factories, and public buildings were erected by the new community, and what was originally agricultural land became urban land with greatly increased value. That the value of this land was in excess of the actual money spent to create it was undoubted, not only because of the careful manner in which the area had been planned, but because of the well-known economic law that the mere growth of a population increases the value of the land on which it arises. It was on this " unearned increment," as it is rather loosely termed, that the finance of the Garden City was based, and it was thought essential that its existence should be demonstrated and the effect of it shown in the company's accounts as soon as practicable.

There were several ways in which this might have been done, but the method adopted was to get the estate valued by independent experts, and in September 1907 that valuation was carried out. The expenditure at that date was £247,806 13s. 11d., and the valuation was £379,500, showing an appreciation of £131,693 6s. 1d. Against this appreciation certain bad assets, expenses, and losses were written off, and a net capital profit of £97,047 6s. 3d. was shown.

This was considered very satisfactory, and provided ample confirmation of the belief of the founders of the town that the undertaking was financially sound. The net profit was not, of course, a realised profit, and for that reason could not be taken into the

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profit and loss account. It merely showed that if the undertaking were disposed of there should be a balance of at least £97,000 over what had been expended on it, directly or indirectly. But although the balance could not be used for the payment of dividends, it was, at any rate, proof of the existence of valuable security for the shareholders.

Readers who are interested in this matter will find the details in connection with it in the appendix, including an extract from the valuers' report which is now published for the first time. The present writer wishes, however, to draw attention to one important matter. After careful examination of the figures and of the terms of the valuers' report, he is of opinion that the directors very considerably underestimated the net increment in value of the estate. The expenditure on the water works, gas works, and electricity supply station at the date of the valuation was £37,365 8s. 1d.; it seems clear to the writer that this expenditure should not have been included as part of the cost of the property in arriving at the appreciation in the value of the estate. The valuers expressly excluded these works from their valuation, together with the timber and gravel, the separate values of which were unknown. They excluded them because in making their valuation they were concerned merely with the value of the land, and the value of these undertakings and the money expended upon them were matters with which they were not concerned. The fact that the facilities provided by these undertakings existed affected the value of the land and was of course taken into account in arriving at that value, but the ownership of them by the company was another matter. The amount of the valuation would have been exactly the same even though the undertakings mentioned had been separate from the company.

The appreciation was, therefore, on this basis, £169,058 14s. 2d., and the net increment in value £134,412 14s. 4d.

V

When the estate was purchased the rentals showed a return of under 2 per cent. on the purchase price, after allowing for outgoings and expenses of collection. The company had, therefore, to begin with, the handicap of a property which did not pay the interest on

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the amount for which it was mortgaged, together with all the exceptional expenses of the initial stages of an enterprise dealing with land on a large scale. The result was that for the first seven years the company's accounts showed a considerable loss on each year's working. For the past two years, however, net profits have been made, and, as a result of a readjustment of the accounts, the profit for 1912 reached a large amount.

The readjustment amounted to this : that whereas in the past certain considerable expenditure incurred in the development of the estate, in the nature of law charges, advertising and office salaries and expenses, had been charged every year to revenue account, for the year 1912 this expenditure was abstracted from that account and held up in the balance sheet as part of the cost of general development. This general development account is written off, periodically, against the amount of the increased value of the estate.

Although the members of the company unanimously passed this readjustment, certain financial papers criticised it adversely, but such criticism has very little to stand on. It may be that the action of the directors looks a little questionable at first sight, but the very slightest examination of the figures confirms the prudence of the board. Expenditure of any sort which is necessary for development and yields an increase of capital value is certainly part of the cost of creating that capital value. The proof that it is capital expenditure lies in the fact of the capital value created. That is the whole basis of the thing, and provides an argument that cannot be disputed.

A company engaged in developing and leasing land is in an entirely different position from a land undertaking in which the freehold is disposed of, and from an ordinary commercial concern. Definite capital value is created with every lease granted, and every farthing of expense which has been directly or indirectly incurred in creating those leases is capital expenditure. To take advertising charges as an example : if a firm is selling cocoa and advertises to create custom, the expenditure on that advertising must be charged to the revenue account, which it is intended to benefit ; if the advertising be on a large scale and likely to produce results for some years, the cost might be spread over two or three years or more, as the

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case may be, but in the end the total cost of advertising will go to revenue. If a company has land to sell and advertises the fact, it will charge its advertising expenses to its revenue account, for the total profits of any sales it may make will go to the credit of that account. But if a company lets land on lease for 99 years, it not only gets revenue but adds to the capital value of its property by every lease it grants, and so long as the advertising is required to get new lessees and not to collect revenue or to retain existing lessees (as a cocoa merchant endeavours to retain his customers) it is a capital charge. A lessee who takes a piece of land is not like a man who buys a tin of cocoa. The lessee will have to pay his rent for 99 years, and is bound to create permanent improvements, and the counterpart of his lease is marketable; the man who buys a tin of cocoa will, very probably, never buy another.

This matter of advertising is used but as an example. The same argument exactly applies to all the other charges which the Garden City Company put to development.

If this method of accounts had been adopted from the first, the company would have made net profits after two or three years. In the first year there was no less than £2500 of London, Letchworth, and general expenses charged to revenue, the whole or greater part of which was, without doubt, development expense with no bearing upon the revenue of the year.

The shareholders will not, however, incur any actual loss through these earlier conservative accounts. The return the estate has earned must come to them in the end. In considering the matter the shareholders should, indeed, be glad that at last the directors have had the courage to adopt a more enlightened method of accountancy. It is to be hoped that before long the directors will feel able to ascertain those other "considerable sums which have been expended for the purpose of developing the estate," "still charged to revenue account,"¹ and put them to the account to which they properly belong.

As it is, however, they have taken a bold and resolute action which is based on sound reasoning, and will prove to be of importance as providing a precedent for future undertakings of a similar character.

¹ See the extract from the Directors' Report, quoted in Appendix C.

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VI

In speaking of "unearned" increment, and of the profits to be derived from land, the legislation of 1909, which was aimed at taxing such profits, may be mentioned. That legislation imposed an increment duty and an undeveloped-land tax which are sufficiently explanatory in themselves; they have occasioned too much controversy for us to enter upon any discussion of them here. It is sufficient to say three things. First, that Mr. Lloyd George has repeatedly stated, inside the House of Commons and outside it, that these taxes would not affect the Garden City; secondly, that in the case of the Garden City the values on which these taxes would be levied are not accidental or due to the natural increase of population, but have been directly created by the Garden City Company, because they formulated the scheme for the building of the town and took the risks the attempt at the creation of those values involved; thirdly, that the values are being created in the interest of the community, and not for the purpose of private speculation. The valuations have not yet been made, and it is too early to say what the outcome will be. In the meantime, the Garden City may very well rely upon the chancellor's promise, and it is possible that when the amendment of the Finance Act of 1909 is undertaken the Garden City will find that it and similar enterprises that may be started will be exempted from the payment of taxes that would severely hamper their growth.

VII

In conclusion, it cannot be overlooked that an enterprise like the Garden City offers an investment for English money on English soil. It is a step not merely in the improvement and reform but in the actual development of our country, and as such must appeal with some force to patriotic men and women. Sentimental considerations are supposed to have no bearing on finance, but the

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average man may still be expected to be moved by an attempt to increase the wealth and well-being of England. That the Garden City and those principles and ideals for which it stands do make for the greater health and prosperity of the people, the writer believes this book to show. And when that service to the race is done not merely as a measure of philanthropy but as honest business which gives ample security and a fair return to those who embark upon it, ordinary investors may be expected to put their money into it, in preference to giving their aid to the development of China or South American republics.

The promoters of the Garden City have been exceedingly cautious in approaching the ordinary investor. At first they did not go to him at all, but to the social reformer and philanthropist, and the consequence was that they got very little money beyond the odd amounts which such rather hard-up people had to spare. In the first prospectus, while stating their belief that the "undertaking will soon become dividend paying and prove a sound investment," the directors had also to point out that "it is difficult to speak with certainty of an undertaking which presents some features of novelty." In a circular letter appealing for financial support dated December 12, 1904, it is stated that the directors "do not deem it advisable to appeal to the general public for capital until the operations of the company are somewhat more advanced." A prospectus dated June 11, 1906, which was widely advertised and circulated to the public, goes so far as to declare that "the directors consider themselves justified in stating their conviction, after an experience of over two years, that the success of the enterprise in a certain degree is assured." But while such qualifications of the position of the company testified to the honesty of the directors, they were not such as to draw money out of the pockets of the careful man. It is, therefore, a matter of some congratulation that without any undue optimism as to the success of the undertaking, and without highly coloured appeals, the company has been able to secure as much support as it has actually got.

Now that the town is in being and has been proved to have the sound economic basis its promoters believed it to possess, there is no reason why the ordinary investor should not look upon Garden City

Some Questions of Garden City Finance

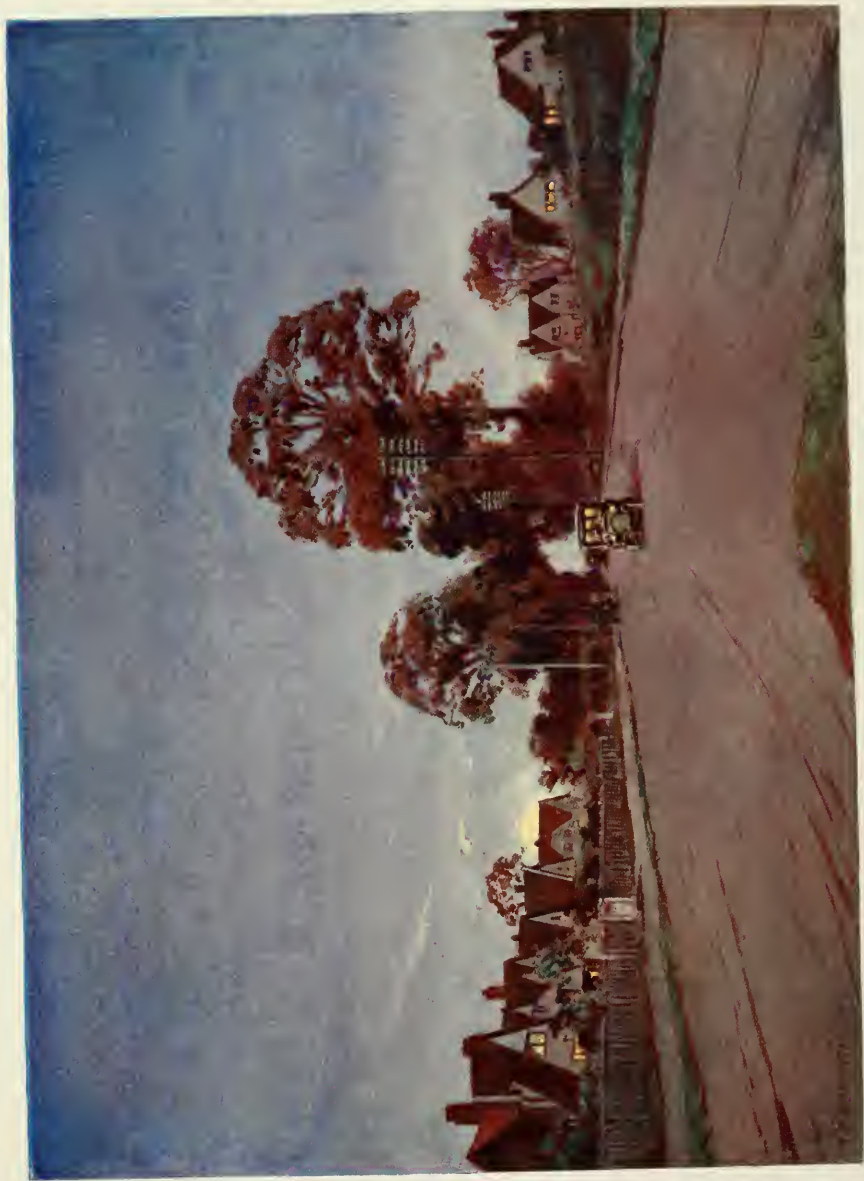
with considerable favour ; nor is there any reason why the Garden City Company should not bring its shares to the notice of investors with complete confidence that they offer almost unrivalled security for capital. The banks, insurance companies, and large business houses that have considerable investments in the town and its enterprises provide reasonable ground for supposing that what is good enough for them should be good enough for others. Added to which there is the romance of the whole idea of Garden City, the pleasure that even investors must feel in taking part in so fine an adventure as the building of a new town. The directors of the company, while receiving subscriptions for share capital every month of the year, have not made any public issue of a prospectus for more than four years, and it is to be expected that, when next they come before the public for the support they have every reason to anticipate, they will present a case that will convince every doubter, because without apology or qualification they will have actual success on which to rely for confirmation of the prospects of the future.

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A word should be added on the way in which the finances of the company touch the town. Garden City is, of course, subject to imperial taxation and county and poor rates. In this respect it is like every other town. The Garden City Company undertakes the sewage disposal and the maintenance of the roads not yet taken over by the county authorities, and makes a small charge for these services to the leaseholders concerned. There is no reason to suppose that the ordinary rates in Garden City will be more than the average for a town of its size ; and there is every likelihood that before many years are gone those rates will be lower. As the town develops and the company's profits increase (as they are bound to do), it will be possible for the company to devote a proportion of its surplus profits, after paying the 5 per cent. dividend, for the benefit of the town. The clause in the constitution of the company already quoted empowers the directors to do this.

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It is, at present, too early to say when the profits will reach the point at which this will be possible ; it depends, however, upon one factor only : the development of the town. The more rapidly the town progresses the greater the benefits the townsmen will secure. And in the end the Garden City, owing to the ownership of its land being secured to it, will—it is not too ridiculous to hope—be the town its promoters imagined, a town without rates at all.



On the road to Cambridge

CHAPTER XVI

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"For as in a body, when the blood is fresh, the spirits pure and vigorous, not only to vital, but to rational faculties, and those in the acutest and the pertest operations of wit and subtlety, it argues in what good plight and constitution the body is, so when the cheerfulness of the people is so sprightly up, as that it has, not only wherewith to guard well its own freedom and safety, but to spare, and to bestow upon the solidest and sublimest points of controversy and new invention, it betokens us not degenerated, nor drooping to a fatal decay, but casting off the old and wrinkled skin of corruption, to outlive these pangs and wax young again, entering the glorious ways of truth and prosperous virtue destined to become great and honourable in these latter ages."—JOHN MILTON, *Areopagitica*.

I

HAVING traced the origin of the movement which brought the Garden City into being, and having seen the town as it is from many aspects of its growth, it now remains to draw our conclusions from what the place shows us, and to attempt to estimate its significance in relation to the time. We have discussed in a casual way in the course of this book the ideals with which its promoters set out, but the Garden City of reality is something much more than any ideal. It is now an actual town, with all the defects, the compromises, the adjustments of theory to practice, as well as the happy achievements which belong to work in process of accomplishment. And it may be said at once that as an actual town, while it falls short of its ideal, it is still better than that ideal because the merest bit of practice is worth endless theory. Theory is, indeed, but so much waste of time in all the arts unless it follow practice. The great importance of Garden City to us and to the future is that it provides the material out of which the modern theory may be made.

The theory of the town, the pattern or model of what a town should be, is to-day being slowly pieced together out of the chaos left by the nineteenth century. In that ruthless time the towns emerged from their ancient place in the state, and became formless things of mighty power and dreadful horror. They lost all the

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fine, orderly, and homely qualities they had ever had, and took to themselves every evil weapon which could menace human life. To-day we are seeking to recover the town from what the last century made it and to bring it back to order and beauty. And it is as a contribution to the formation of that ideal that the Garden City and its ideals are of supreme interest. If the new town were but the outcome of a mere æsthetic idea to provide gardens and to force better habits on the people, it might very well be ignored ; if it were but an " organised playground " for amiable faddists, vegetarians, and higher-thinking persons, it would be sufficient to regard it with proper amusement ; but as it is an attempt to demonstrate the practicability of certain ideal principles of town building in order to reconstruct town life, it becomes of importance to us all, for if we could solve the town problem we should have solved the most serious problem of our civilisation.

II

It is because the Garden City of reality is directed towards the remaking of the ideal of town life that its relation to its own ideals is significant. If the town had no meaning beyond its own borders then its ideals would not matter at all, but so long as it stands for something far greater than itself those ideals cannot be disregarded.

The Garden City owes all that it is, and will owe all it is likely to be, to the ideals with which its promoters set out. From the attempt to realise them the town has sprung. If they had not animated the minds of those who founded it, there would have been no town to found. It was under the influence of those ideals that they took great risks and ventured upon an undertaking of which failure was confidently predicted. At the beginning everything was against the scheme ; the inexperience of those associated with it, the limitation of their financial resources, the weight of prejudice it met with, and the ridicule it had to suffer, all combined to raise against it walls of difficulty which only courage and faith could overthrow ; and the fact that in ten years the initial difficulties

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have been largely overcome is testimony not only to the force of those ideals but to the strength with which they were held.

Those ideals were very simple. They were all summed up in the endeavour to found a healthy, well-organised, and economical town, based on the corporate ownership of land. In that town none of the preventable evils of modern cities were to be admitted; people of all classes were to have decent homes; and industry was to be carried on under wholesome conditions. It has been the object of this book to show how these ideals have been realised. The extent to which they have been realised has depended upon the degree to which they were held as firm principles which were to govern the action of the promoters in developing the town.

A town which is built to express an ideal cannot be as one which is built haphazard. Garden City must, therefore, simply because it is the product of idealism, be different from all other places and possess a character which that idealism will very markedly form. The very fact that Garden City is being built with a purpose, that it is the conscious creation of those who believe in a new kind of town life, will necessarily dominate its development. The existence of that purpose, of an idea behind the town which is shaping it as it grows, makes the town unique. And it is to the idealism which lies at the root of that uniqueness that its powerful appeal is due.

When we ask ourselves what it is in Garden City that has brought so many people to it, that keeps people living there and firms working there, when they might easily leave it, we shall find that the chief thing is not economy, or even healthiness, but the mere modernity of the place. It is because the Garden City is the town of the twentieth century, the town in which new life, new methods, new ambitions may be exercised, that it appeals so strongly and insistently to so many various men. It is the novelty of the place that is of most imperative value to it; it is everything that has its basis in the original ideals.

Now, if we are to believe what we sometimes hear in the town, we would believe that this newness, this fresh and youthful spirit, is the one thing of which its people need to make no boast, which, indeed, they had far better stifle. There is pride in the voices of

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some good people when they recognise in the town likenesses to other places, and shame comes upon them when they perceive in it what has not been heard of elsewhere. But that attitude of mind is bred of the most dire folly. Here we have a town which in its foundation, in its character, and in the motives which have created it sounds the high note of a worthy idealism ; never before in modern history has a town been laid out with such enthusiasm and earnest purpose ; never before in the history of the world has a town grown out of such noble and sincere desires for public welfare and for the enrichment of the race ; and yet all these fine and rare qualities are to be reckoned of little worth and paltry things are to be held up for admiration.

It is easy to understand that, in the face of financial and other troubles, of the doubt that existed in the public mind, and of the timidity of the average man, those on whom rested the responsibility of bringing the Garden City to a successful issue were reluctant to countenance anything that might threaten to interfere in the least degree with the plain, hard, business side of the scheme. That the undertaking should be shown to be financially sound was one of the most essential conditions not only of the success of the first Garden City but of the development of future towns on similar lines. If the initial Garden City failed financially it might fail altogether, and there would be an end to the great national reform which it was designed to usher in.

The promoters have, therefore, in the name of commerce, finance, and common sense, been urged times without number not merely to sacrifice some part of their ideals but to discourage the association of idealism with the building of the town. What connection, it has been said, have wide roads and twelve houses to the acre with ideals ? Why not let us be content to say that the town is an attempt to house people decently as a mere business proposition ? Why talk about ideals and principles at all ? But such arguments fail entirely to take into account that only to the extent that the success of Garden City is the successful application of ideals to the problems of the town, the place becomes of any value as a model to England and the world. A certain kind of success might be secured on almost any basis, but it is not the successful completion

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of Garden City that matters ; one town of thirty thousand inhabitants is nothing. The influence of the place depends entirely upon the degree to which it makes its ideal practicable ; if it prove any other thing to be practicable it might just as well have never existed, for that has often been done before. What Garden City is required to do is to attempt to carry out what has never been done before.

And it may be added that without the acknowledgment of the ideals on which the town is based there is no guarantee that the principle of twelve houses to the acre or any other of the principles of development will be maintained. The ideals in the case of Garden City constitute the primary elements of the business proposition ; apart from them all is chance.

No one will deny that the economic success of Garden City is a matter of great importance ; but in the building of a town long views must be taken and much patience is required. The degradation of the town to the level of an ordinary building estate, by letting large areas of it for any purpose, by destroying the agricultural belt, and by the disposal of the freehold, might not damage the financial position of the shareholders, but it would be the ruin of every other thing. If profits were the main consideration in connection with Garden City, then all who assisted in its exploitation might soon rejoice in their success. But in seizing the fruits that could be made rapidly to ripen, and in neglecting the culture of more precious and permanent things, all that was noble and fine and praiseworthy in the scheme would be sacrificed.

Even from a business point of view nothing better can be said than that Garden City should take its stand on its modern qualities, on its differences from other towns, and on its origin as a product of the spirit of the time. A stand so taken will pay in the long run. It will pay not only in coin but in more substantial things.

The fact is that Garden City is not a town for everybody. For that matter no town or village or country ever was. There are those who love parts of London and hate Manchester. There are others who like Bedford but detest Birmingham. There are some who delight in the small town that is asleep ; there are some who are at home on solitary hillsides ; there are some who like the valleys of England ; there are some who like best of all the old towns of

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France. The tastes of men are very various. It would be impossible to make Garden City suit every taste. It would be absurd to try. What has to be recognised is this : Garden City will suit some people far better than any town they know. They will be the people who are tired of what already exists, and long for some new and better thing. They will be the people, the rapidly increasing number of people, who, shaking from them the victories of the dead past, are looking for new conquests. They will be the people, young in mind, who want adventure. Others will not like it, or at least will not like it so well. There is no need to pretend that they will. What the Garden City has to do is to fit itself more and more perfectly for those who will find greatest joy and satisfaction in it. It need not ignore or despise or reject others, it should welcome them when they come ; but never should it let them weaken what is distinctive in itself.

It is impossible to think to make a new town without the spirit of the time. To the degree in which that spirit is vigorous will the town prosper and grow ; for it is the only spirit that can bring health to men of to-day and their affairs. If any good is to come out of our time, that spirit, enterprising and alert, will create it. If any beauty, power, enduring possessions are to be left by this age, they will be its work. We may dislike many of its manifestations, we may deplore its excesses, we may fight its errors ; but there it is, in us all and in all our concerns, in commerce, in art, in religion, in family life.

If the Garden City is to ride to complete success it will be on the wave of that spirit as it breaks over time. If we be wise we shall seize the opportunities it gives us and use them for all they are worth. We shall rejoice in the fact that in our new town the new spirit may find a perfect home. We shall say to all the world : Here in Garden City, in the town we have made, can men and women of to-day find the fairest, the most efficient, the most complete and adaptable means for the pursuit of their business and for the delight of their lives. Here are none of the fashions of old towns to hamper, no old traditions to break down, no old buildings or machinery to scrap, no ugliness of years to cover. Here you can work out what is in you.

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III

In any discussion of Garden City and its ideals we are sure to find the town spoken of as an example of town-planning, and it will be interesting, as it is necessary, to make the relation of Garden City to the town-planning movement quite plain. That relation may be expressed in very few words. Garden City is not, except incidentally, a town-planning scheme. The term does not appear in Mr. Howard's book, and it was not used in connection with the initial propaganda which brought the town into being. It is true that Garden City has a "town-plan," and that in *Garden Cities of To-morrow* the necessity of a plan was made clear: "We now come to deal with an element of economy which will be simply incalculable. This is to be found in the fact that the town is definitely planned, so that the whole question of municipal administration may be dealt with by one far-reaching scheme. . . . It is essential . . . that there should be unity of design and purpose—that the town should be planned as a whole, and not left to grow up in a chaotic manner as has been the case with all English towns, and more or less so with the towns of all countries" (p. 51). It is true, also, that the development of the town in accordance with the town-plan, and control over the kind and disposition of buildings, are or should be matters of definite rule in the Garden City. But they are, after all, "elements of economy" in the thing, not the thing itself. In spite of that, the town has become entangled with the town-planning agitation of the last few years, and it is possible that it has been prejudiced in the eyes of some people in consequence.

Town-planning came into vogue a year or two after the foundation of Garden City. It was largely a result of the labours of Mr. T. C. Horsfall who, since the late eighties, had endeavoured to bring to the knowledge of English local authorities the methods of the town authorities of Germany in the control of their towns. To him more than to any other man town-planning in England owes its origin, and whatever may be thought of the subsequent English practice in the matter, there can be no two opinions as to the great value of Mr. Horsfall's own work in making the continental practice

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known. The Germans had studied town development for years, they devoted to it the same scientific spirit which had gone to the organisation of their industries, and they produced the same hard, practical, rapid, and (up to a point) successful results in the one as in the other. And as England is always ready to follow the lead of Germany and to believe that what its great rival does is well done, it was not very strange that as soon as what the Germans had accomplished in town development was known in England, people who make a habit of reform held up the example of Germany for English architects and engineers to imitate, which as usual they very readily did.

The consequence was that town-planning dawned on the English mind as a means of social reform, and it was preached in season and out of season as a great advance on our own methods, and a matter in which it would be fatal to our national prosperity to let the Germans excel. Town-planners in hundreds spent their holidays in Germany examining the German towns; and at a time when the German methods were being given up in that country they were triumphantly brought over to England for adoption by the progressive English public.

The first outcome of the movement was the formation of garden suburbs, in which certain features of Garden City were copied; but the most important outcome was Mr. John Burns's Housing and Town Planning Act of 1909. Now, it is only necessary to study these two things to see how utterly different, to see, indeed, how greatly opposed they and the Garden City are. Mr. Burns's Act sets up machinery for the extension of towns and, like the garden suburbs, maintains the very thing which Garden City declares to be fundamentally wrong. It was to put an end to the extension of towns and the building of suburbs that Garden City was founded. It was to stop the great towns growing that the new town was begun. The essential idea of town-planning as it is practised in England is the antithesis of the Garden City idea. The town-planner says: We want to lay out in advance the land over which our towns are to spread; we want to schedule these green fields for the town more easily to swallow; we want to prepare for the endless growth of the huge monster. The Garden City says: We need to put a limit to

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the size of the town ; we need to preserve these fields so that they shall not be destroyed ; we need to re-make town life in small towns in the midst of the country.

Except among the people who asked for it Mr. Burns's Act, like all Acts of Parliament, aroused no enthusiasm. It could arouse no enthusiasm because the need for it had long gone by, and people were already beginning to realise that the great towns were doomed. At the time in the last century when those towns were growing it might have been of use. To-day it is merely a comment upon the unwisdom of the past. To-day we need an Act to discourage the growth of towns and to insist upon the preservation of their boundaries.

But we do not need to look for salvation to Acts of Parliament. If new life is to come to a people, and a new principle in the making of their towns, they will be found already there and active before Parliament hears of them. The promoters of the Garden City did not wait for Parliament ; they went boldly on with their enterprise, initiating a new movement for the succour of English urban life. So far as Garden City is concerned and the movement for which it stands, the Act of 1909 might just as well have never been passed.

We often hear the expression, " Town-planning on Garden City lines," but the phrase in the sense in which it is used, *i.e.* in connection with the growth of suburbs, is an absurdity. Town-planning on Garden City lines is the planning of new small towns. It is nothing else. The fact that the new suburbs appropriate part of the name of the new town, and even allow themselves to imitate certain details of its development, is, perhaps, a compliment to the Garden City, but it is nothing more.

IV

What is essential in Garden City is not town-planning. If it were, the town would be of minor interest even as a town-planning scheme. The point of first importance in connection with Garden City is that it is based upon a change in the ownership of land. It is essentially an attempt, not at land nationalisation, or of ownership

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by the central authority, but of local ownership, or municipalisation. Mr. Howard took this idea from a proposal made by Thomas Spence in 1775. This man, who was a well-known character in his day, in a lecture delivered at Newcastle (republished in 1882) advocated the ownership of land by the parishes. "Thus," says he, "are there no more nor other landlords in the whole country than the parishes, and each of them is sovereign landlord of its own territory. . . . Then you may behold the rent which the people have paid into the parish treasuries employed by each parish in paying the government its share of the sum which the Parliament or National Congress at any time grants ; in maintaining and relieving its own poor, and people out of work ; in paying the necessary officers their salaries ; in building, repairing, and adorning its houses, bridges, and other structures ; in making and maintaining convenient and delightful streets, highways, and passages both for foot and carriages. . . . There are no tolls or taxes of any kind paid among them by native or foreigner, but the aforesaid rent, which every person pays to the parish, according to the quantity, quality, and conveniences of the land, housing, etc., which he occupies in it."

The Garden City is endeavouring to carry out the idea of Spence. At present, of course, the freehold is not in public ownership, but it is in local ownership, or more correctly, in the ownership of those who are employing it for the benefit of the local community, with provision for more direct local ownership when the town is sufficiently complete.

After the payment of the fixed dividend to the shareholders, the balance of the profits from the land and the public services is available for all kinds of public purposes, and as time goes on and these profits increase, as they undoubtedly will do, the town will have funds not only for defraying expenses usually met out of the rates but for schools, entertainments, and amenities of every description.

It is this attempt to deal first with the problem of the land which adds to the interest of the town. Garden City will provide the first instance in this country of a community holding the entire freehold of its own area.

How the transfer from the company to the public authority will be effected is at present a matter of considerable doubt. More

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than two years before the foundation of the town, the Garden City Association issued a pamphlet in which the following method was suggested : " At any time after seven years from the formation of the company, the adult inhabitants of Garden City shall be entitled to elect a board of trustees, which board shall purchase the whole of the shares of the company, on pre-arranged terms, and shall henceforth hold the same in trust for the whole of the inhabitants of Garden City ; and when such shares have been purchased as aforesaid, then and thereafter for ever, the inhabitants shall elect their board of directors, and have entire control over the affairs of the company."

This statement does not, of course, concern the Garden City Company, except to the extent to which it gives an indication of the ideas of the early promoters of the scheme. The term of seven years was evidently thought to be sufficient for the substantial completion of the town ; it is probable that had the difficulties of its establishment been foreseen, a considerably longer period would have been mentioned before the inhabitants were supposed to take control. The ideas of the early promoters do not help us very much in solving the practical problem, though they show clearly, as, indeed, does all the literature published in the early days, as well as the memorandum and articles of the company, that the handing over of the entire undertaking to the local community or a body representing it was always contemplated.

There are several ways in which the freehold might be acquired by the community :

(1) The local authority for the time being might purchase such portions of the undertaking as the Local Government Board would allow (for example, the gas, water, and electric works, parks, allotments, sewage disposal works, etc.) and receive the balance of the property as a gift. This is on the assumption (a) that the purchase price of those portions would be sufficient to liquidate the capital, loans, and liabilities of the company ; (b) that the rateable value of the town would be sufficient to secure the sanction of the Local Government Board to the necessary loans.

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(2) The local authority for the time being might obtain a special Act of Parliament to empower it to purchase the complete undertaking and pay for it by money borrowed on the security of the undertaking itself.

(3) A trust might be created, or the Garden City Company might be converted into such a trust, for holding and administering the land in the interest of the inhabitants. This is similar to Mr. Howard's original idea. His board of management, or central council, was constituted by trust deed as the owner of the land : " In this council (or its nominees) are vested the rights and powers of the community as sole landlord of Garden City."¹ The members of the council were to be elected by the tenants.

It is unlikely, however, that it will be practicable to carry any of these proposals into effect for many years to come, certainly not until the development of the town is far more advanced than it is at present. There is, further, no reason to suppose that anything would be gained by taking such a step. There are no signs at present that the community, or any body acting on its behalf, could undertake the development of the town more efficiently than the company does. It is far better for the community to confine itself to assisting the company, and to acting in the capacity of a friendly but severe critic, of a critic, moreover, who is directly concerned in what the company does, than for it to take upon its shoulders the burden of executing the actual work.

V

The question may be asked : How are the new towns, of which Garden City is the type, to be formed ? Not by the big municipalities, of course, for the new towns will compete with them. Not by little rural authorities, for they will not possess the organisation. Not by the state, for that is too heavy and cumbersome to create so delicate an organism. It would seem that these towns will have to be founded by the enterprise of private citizens, by men of

¹ *Garden Cities of To-morrow*, p. 71.

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imagination and business training who devote themselves to public service. It has been suggested that, after the completion of the first Garden City, the Garden City Company should become a national trust for building new towns wherever they may be required. "In a few years," said the chairman of the company at the annual meeting of shareholders in 1912, "our work for Letchworth should be so far advanced that we can hand over its final stages to the inhabitants. When, in that way, the capital of the company—much larger then, I doubt not, than now—is liberated for further work, I hope that whoever you trust with the control of the company's affairs will have the courage to go on with a second, third, and fourth Garden City; will, in fact, be prepared to take in hand any area to which some great manufacturer desires to transfer his works from the overcrowded town, or where new collieries are being sunk, or a new port being opened, or a new railway junction being formed. In all such cases there is not only room but need for Garden City development of the new town that is bound to arise, and I trust that many of you may live to see the day when this company is recognised as a National Trust for carrying out that work." It will be in the search for methods of industrial efficiency, for perfect conditions of public health, and in the attempt to preserve the beauties of England that the new Garden Cities will arise.

It is true that the idea of the creation of new towns does not commend itself to many English people. Such towns, say they, would be artificial and contrary to all ancient practice. The attempt to reduce to rule and system what is considered to be outside the conscious direction of man is disliked. The manner of the foundation of a town and the nature of its growth belong, it is said, to those kinds of human activity that, without being altogether unintelligent, are yet unconscious; they are the achievements of the corporate will, but they are not the result of any process of reasoning. There is a great deal to be said for this view, and it is a pity that town-planners in this country appear to ignore it. But, on the other hand, it must be remembered that new villages are everywhere arising, villages are becoming towns, and towns are becoming larger. The nineteenth century should have taught us that to leave the growth of these towns and villages to chance is to leave them to the speculator

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and to those who care for little but money and profits. All our finer instincts rebel against leaving so important a matter as town-making to the mercy of those who care only for material things. Whether we like it or not we must in our day learn the science and art of town-building in order that our towns may be worthy of us. And while town-planning may appear to be a rather muddled and unsatisfactory thing at present, because it is concerned so much with maintaining the towns of the past century, yet the science is hardly understood ; when the men who work in it, learning the lesson of Garden City, leave the old towns and their suburbs and strike out into something new, we may hope for work that will not disgrace our time.

The rise of town-planning shows that we are ready for a change in our methods of urban development, and when, in a few years, the impracticability and folly of Germanising England is seen, we shall turn to more sensible and native proposals for re-making the town. It is certain that we are on the eve of great changes. The twentieth century will not repeat the blind follies of the last ; its people have a new temper and outlook and desire new things. The last census has proved that except for business the great cities are beginning to be deserted. The populations of central areas are declining. People are taking their homes further and further out in the country and keeping the city for buying, selling, and manufacture. It may be that the tendency will extend. Not only will people remove their homes ; they will remove their businesses as well. Then the day of the suburb will be over.

When that day comes, we shall have once again in England a time of small towns. "Perhaps," says Mr. Belloc, "even before our children are men, those parts which survive from a better order will be accepted as models, and England will be rebuilt again." The parts which survive are the little towns. There is plenty of room in the country for small towns to arise for the increasing population, so that England may regain something of that life which the nineteenth century destroyed. These towns will be ten, twenty, or thirty miles apart—the farther the better ; railways will link them up and bring men to the great centres only for occasional visits of business and pleasure. But the normal life of men will be lived in the little

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town. There will good escape be made from tubes and taxis and from all that makes our modern cities unbearable. Then men will get to love their towns and take pride in them to a degree that it is impossible for the present-day inhabitants of London, Birmingham, or Manchester.

VI

The great value of the Garden City lies in its having brought some qualities of the imagination to the building of the town. It has shown how essential it is that a town, being the expression of corporate life, should not be sacrificed to individual rapacity or stupidity, but should bear upon it the marks of the more admirable elements in the mind and purpose of the community. It has shown how an ideal may be allowed to influence the development of an industrial centre, with advantage to every one concerned. Finally, as we have just said, it has shown that the small town is once more practicable in England.

It has done all these things once in order that they may be done again. What it has accomplished in one place may be done throughout the country. And not only in this country, but abroad. It is in the colonies that the immediate lessons of Garden City may be taken most readily to heart. There, where towns grow up with a rapidity which has no parallel in history, the governments could make provision for their healthy development, and easily escape the monstrous evils of the Old World. So far we have seen in the new countries only a repetition of many of the follies committed in nineteenth-century Europe, but it is not too late for a more far-sighted and enlightened policy, if not entirely to undo the mistakes already made at least to prevent their perpetration. In Canada, in Australia, in New Zealand there are opportunities for building fine cities that, not in magnificence, but in the simple decent order of their formation may secure the health and well-being of their inhabitants, and be the envy of the world.

It will be some years before the Garden City nears the stage of completion and before the full benefits of its growth are enjoyed, but already, after ten years of strenuous activity, it shows the qualities

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of permanence and fair promise of a rich harvest in the way of social improvement. Its building has been a fine enterprise which will be a lasting testimony to the courage and ability of those who have been engaged in it. It is yet "but a city in its cradle," and what it has before it of achievements, when it has grown to its full height, who can tell? Most certainly, it provides the foundation of perfection in the conditions of individual homes, as well as of the development of civic activity, the like of which we have not yet seen. "For they say that Kinge Utopus him selfe, even at the first beginning appointed, and drewe furth the platte fourme of the citie into this fashion and figure that it hath now, but the gallant garnishinge, and the beautifull settinge furth of it, whereunto he sawe that one mannes age would not suffice: that he left to his posteritie." The simplicity of the town's beginning, the fact that it was not founded with great noise of trumpets or with high patronage or great gifts of money, but had upon it what the enthusiasm and noble faith of ordinary men and women could bestow, is a good sign to those who believe in the value of quiet work.

Looking at the town to-day with its active industries, feeling the charm of its social and residential life, and considering its general air of prosperity, it is hard to realise that so few years ago the name of Garden City was one of which men were sceptical and in which none but a few enthusiasts believed. It is hard to realise that where men now come in increasing numbers to do their business and to set up their homes was but recently a countryside with a diminishing population, the life of which had seemingly passed for ever. The change that the Garden City has opened up in North Hertfordshire is only second as a cause for wonder to the success of the town itself. New energy has been brought into the whole district. The people have been aroused out of their fatal sleep; and where land was neglected and buildings decaying, there has come a new life with fresh motives and vigour.

APPENDIX A

LAND TENURE IN GARDEN CITY

ON the eastern edge of the Garden City Estate, on your right hand as you follow the road from Willian to Baldock, there are two narrow strips of land, like parallel horns, belonging to First Garden City, Ltd., but running out for about 300 yards into the land of adjoining owners. These are said to be a remnant of an old English land tenure, dating from the time when the cultivated land belonging to the village was re-allotted from time to time in narrow strips to the various householders. Thus in Letchworth we have always before us a reminder of the terms, varying from age to age, on which individuals have held land. We do not talk of holding chattels, such as carts and horses or money, but of owning them; whereas it is an old-established principle in England that men do not own land, but hold it, the ultimate and only owner of English land being the king, as representing the state or community. In old times this public ownership was a very real thing: in rent and services and rights the state derived most of its resources from the land, and the landholder rendered payment and services amply sufficient to remind him that the land he held, though handed down from father to son, was not his, but the state's. For the last 200 years or more the substantial interest of the state in the land has, no doubt, been but an insignificant remnant, yet the theory remains as clearly established in our law as ever.

Moreover, while the freeholder of land is the first tenant under the king, he has the right of creating tenants under him, and they tenants under them; and the different rents and services, conditions and restrictions attached to these various tenancies very greatly affect the use of the land and the prosperity of the tenants and of the community at large. Who owns chattels, and how they are let out on hire from man to man, are no doubt important matters; but

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after all the supply of these chattels can, for the most part, be indefinitely increased by human industry, whereas the supply of land is almost absolutely limited. No man can live without the use of land, and no man can add appreciably to the supply of it. When, therefore, First Garden City, Ltd., became tenant under the king, or, as we commonly say, owner, of the Letchworth Estate, the tenure by which the company held the land from the crown was indeed fixed, and unchangeable save by the law of the land ; but the tenure of those occupying and cultivating parts of the estate, and of the much larger number of future inhabitants, was subject to the company's decision, and opened out many different possibilities of far-reaching effect. The tenants might have been allowed to acquire parts of the estate as freeholders, or on long or short leaseholds for years, or on leases for lives, or as yearly tenants, or tenants at will ; the rents might have been high or low, they might have been fixed once for all for a long period, or re-assessed from time to time ; the company might have granted leases of land only, or of land with buildings upon it. In fact there were almost innumerable tenures which might have been set up, each of which would have entailed very different consequences in the development of the estate.

Perhaps the first principle in choosing a tenure is, that every good land system must give security to the man who makes improvements on the land, by the application of his industry or capital—security that the wealth resulting from his exertions shall come back to himself. Without this, industry and the application of capital will be discouraged, the production of wealth reduced to a minimum, and the community impoverished. This principle is, of course, some guide, but not much ; for many different tenures profess to give the required security, and probably do so in varying circumstances. However, the ideas which Mr. Howard had put forward in his book *To-morrow* (afterwards called *Garden Cities of To-morrow*) were much more definite on the subject of land tenure than this. He based his proposals on the scheme of public land ownership formulated by Thomas Spence, of Newcastle-on-Tyne, about the year 1775. This scheme was that the land, subject no doubt to the supreme ownership of the king, should be owned by

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the local community, or by trustees for them ; that the revenue of the land should, therefore, go into the public coffers to pay public expenses. In the case of Garden City, where, of course, the land must first of all be bought, Mr. Howard proposed that the increment caused by the accession of population to the estate—the so-called unearned increment in land value—should be used as a fund for public improvements and public services, after paying out of the gross revenues of the estate interest and redemption on the purchase price of the land, such purchase price representing its agricultural value. From this it followed that the Letchworth land tenure must keep as much as possible of this unearned increment for the trustees or other public owner, and while giving the occupier of the land the utmost possible security for the produce of his labour and capital, must hand over to him as little as possible of the wealth produced socially by the coming of population, and by the growth of a town and its activities. It was, indeed, the application to public purposes of this unearned increment which was to make possible a great part of the better conditions, the public services, and the amenities of Garden City.

In the two or three years before the purchase of the Letchworth Estate much inquiry and discussion took place among members of the Garden City Association as to the best details in which to embody these principles, and whether the practical, *i.e.* the financial, necessities of the case would make it necessary to resort, in a greater or less degree, to some methods of parcelling out the land to tenants which might depart more or less from the ideal set out above. Mr. Howard and others considered that the most perfect form of land tenure for Letchworth was a perpetual lease under which the tenant would pay, first, a rent and, second, an improvement rate. The rent would be merely sufficient to meet the interest on the purchase price of the estate, including the legal expenses of purchase, and a small sum for redemption of the capital ; the object of this redemption was that rent, in the true sense, might eventually altogether cease to be levied. The improvement rate would continue. It would not, he pointed out, be in the nature of rent at all, but would be a payment which the tenant undertook to make in return for the public services which First Garden City, Ltd.,

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was to render to all its tenants and all the inhabitants on its estate. It was at first thought that these public services would be extensive, including schools, open spaces, public libraries, and music, besides trams, gas, water, and other things for which direct payments would be made. Many of us, however, doubted whether this form of tenure was not so novel as to frighten away manufacturers and other tenants, who would be unwilling to undertake to pay an improvement rate varying from time to time, and re-assessed by a form of arbitration, while they were already under an obligation to pay the ordinary rates of the local authority. Moreover, it was doubted whether the proposal of a small rent and an improvement rate would in fact retain for the public the unearned increment. On the whole it was decided that people coming to Garden City must be offered land on terms as similar as might be to those they had been accustomed to elsewhere, provision being, however, made not only for the proper laying out of the town in the first place but for maintaining it so permanently, for the avoidance of nuisance and annoyance by any one tenant to the others, and for bringing as much as possible of the land value into the public purse. It was also seen, more and more clearly, that the real difficulty of the Garden City scheme would be in its early years, and would consist in the financial difficulty of making it pay its expenses and the interest on the capital expended. To meet these practical necessities a good many suggestions were made.

Evidently if sufficient capital could have been obtained to pay for the estate, and to leave, say, £100,000 to do the first building of houses and factories, early development would have been very much expedited, for far more people would have come to rent a house or factory than to build. In this way, too, the company could have retained most of the unearned increment, seeing that such lettings are ordinarily made for comparatively short periods, seven, fourteen, or twenty-one years, or even much less, and on the expiration of the first terms the rent could have been raised to equal the new value. Unfortunately it very soon became evident that the public were not going to subscribe nearly enough capital for proceeding upon these lines. It became evident that we must fall back upon the letting of sites at a ground rent, or even the selling of them, to those

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who were prepared to build. As between letting and selling, the former offered the maximum of financial difficulties in the early years of the company, for heavy expenses of road-making, management, etc., had to be incurred before any ground rents at all became payable, and after that the total of ground rents payable only crept up slowly year by year. In order to meet this difficulty and enable not only expenditure but interest on capital to be paid in the early years of the company, it was proposed to sell parts of the estate freehold, or else to sell leases of parts of it, such leases being at a small, perhaps nominal, ground rent. The purchase money of these freeholds, or the premiums on these leases, would have brought in a very considerable sum of profit in the early years. Covenants would, of course, have been necessary to secure the general interests of the estate. In the case of leases there would have been no difficulty at all about such covenants ; and, though the matter was not quite so easy in the case of selling freeholds, it was thought that the desired control might still have been retained. Unfortunately, however, there were mortgages on all the company's land resulting from the fact that the public had only subscribed at first about £70,000 in share capital, whereas the purchase price of the estate was more than twice that amount. The existence of these mortgages proved a fatal obstacle to the selling of freeholds or even of leaseholds.

We were, therefore, driven back upon leases at a ground rent without a premium. It was suggested that these leases should be for 999 years, so that the tenant would become practically the perpetual owner of the land, subject to the ground rent and covenants. Clearly, if the ground rent had been fixed for the whole of so long a period, any unearned increment that might arise on the plots so let would have been lost to the community, and have passed entirely into the hands of the lessee. It was therefore proposed that every ten years the ground rent should be revised according to the then value of the land, without including, of course, the value of any buildings or improvements which the tenant had put upon it. It could not, however, be decreased to below its original amount. This new value was to be fixed not arbitrarily by the company but by agreement with the tenant, or failing agreement, by impartial

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arbitration. In this way the tenant would get absolute security for all time for his expenditure of labour and capital, and the community would get practically the whole of the unearned increment in the value of the land. A few such leases were, in fact, taken up, but there were very practical objections to them. First, from the point of view of the company: the lessee, foreseeing that his rent would be increased as the city prospered, very naturally expected that it should begin at a lower figure than he would have been willing to pay if it had been a fixed rent. This, therefore, meant a sacrifice of income by the company in its early days, just when it was least able to afford it. From the lessee's point of view, fears were felt lest the ground rent should go up by leaps and bounds at the periodical re-valuations, and in some cases the company was obliged to consent that the decennial rises, if any, should not exceed a certain maximum amount. These, however, were by no means the greatest difficulties: the tenants who took such leases usually needed to borrow money on mortgage, to build their houses, or to fit up or enlarge their factories, or extend their businesses; and in all such cases solicitors and mortgagees, being quite uninterested probably in the Garden City idea, intimated that the form of lease was uncouth, that they could not in the least foresee what might happen to their security under it, and in short that they would not touch it. So these leases, of which I was myself an earnest advocate, were nearly all brought back to us with the request that we would exchange them for an ordinary 99 years' lease at a fixed rent, which had no doubt the theoretical disadvantages that the company bargained away any unearned increment on that plot during that period, and that the tenant would forfeit to the landlord his buildings and improvements at the end of it, but which, nevertheless, gave great practical advantages to both sides meanwhile, and enabled us to get to work.

Thus, after considering all possibilities and trying experimentally what seemed a more perfect plan, we found that our aim could best be achieved by 99 years' leases at a fixed rent, with covenants as to the value of buildings to be put on the plot, the building line to be observed, the purpose for which the plot and the buildings on it were to be used, the prevention of smoke and nuisance, the keeping

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of the garden in good order, buildings in repair, and so on. Our leases also contained a covenant that the lessee would bear his proportion of the cost of maintaining the roads and sewers until these should be taken over by the local authority, and his proportion of the cost of sewage disposal ; also that he would, at some future time, pay for the channelling and kerbing of the road along his frontage. These provisions comprised all that remained of Mr. Howard's proposal that the lessee should undertake to pay to the company an improvement rate of varying amount in addition to a fixed ground rent. The expenses they were to cover could not in any case be heavy, and as a matter of fact the company itself bore, in its early years, the whole cost of maintaining the roads and disposing of the sewage, though it had the legal right to throw that cost upon its tenants.

I must not, however, be understood to say that the 99 years' lease is now the only one at Letchworth. For agricultural land, of course, the usual annual tenancies, or very short leases, prevail. For building sites the old 999 years' lease at a rent revisable every ten years is still open to any who would like to take it. There is also a new 999 years' lease revisable every 99 years. Moreover, some did not feel it necessary to look so far ahead as that, yet thought the term of 99 years too short for them : in a few such cases the company has covenanted to grant a second term of 99 years, at a rent to be decided at the end of the first term, by a valuation of the land, without the buildings and improvements put upon it by the lessee. A few manufacturers have considered that even this was not enough security for the future, and have required leases for 999 years at a fixed rent. These have only been granted for factories. The whole possibility of making a Garden City depended upon getting manufacturers, and if a man was willing to come with a 999 years' lease, and not willing with a 99 years' lease, then, difficult as it may have been to understand his reasons, it would not have been in the interest of Garden City to turn him away. In the longer lease the covenants for the protection of the town and its amenities are the same as they would have been in the shorter.

In my view it is not very much matter what the lease provides after the expiration of the first 99 years ; the whole face of England

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will be changed before the expiration of that time, and most certainly the whole land system will be. I cannot doubt that long before then local authorities throughout the country will be given wide power to control the use of land, and, when they wish, to make themselves owners of land within their own districts by fair purchase. In short, if Letchworth can establish conditions suitable for the next three generations, it may well leave the future after that for the law of the land, and the wisdom of our descendants, to determine.

Of course it would be a very easy sneer to say that after all Letchworth has fallen back on the same tenure as "the dukes" have long practised on their building estates, but like most easy sneers it would be very far from the full truth. At Letchworth the reversioner, and the controller of the whole estate, is a trustee for the public, not an individual seeking to make his own income as large as possible. This makes all the difference, even when the letter of the deed shows little difference. First Garden City, Ltd., has no object in getting the highest rent or profit out of the land, beyond so much as is necessary to pay 5 per cent. interest on the capital expended. It has declared from the beginning that it would make, and it has consistently made, its aim to attain the maximum of public advantage. It will perhaps be said that every owner of a large estate, if he is long-sighted, must do this in order to make the best profit out of his estate. There is some measure of truth in this, if you compare such an owner with the owner of a small patch surrounded by other people's land, a patch out of which he may, perhaps, make his highest profit by means very damaging to the value of the adjoining sites. Nevertheless, even on a large estate, the public interest and the financial interests of the private owner often part company.

I began by saying that the first requisite in a good land system was that it should give security to those who applied capital and labour to the land. Certainly the system we have adopted at Letchworth does this in a very high degree. At the end of 99 years, it is true, the buildings and improvements usually fall in to the reversioner, *i.e.* to First Garden City, Ltd., or whatever body may represent the company, and possess its rights, at that distant date. A very small sum, however, set aside each year and allowed to

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accumulate at 4 per cent. interest will provide a fund to replace the value of buildings 99 years hence. The loss of buildings at the end of such a lease is, no doubt, felt to be a hardship by the small man who remembers that his father, or grandfather, put them up ; but it is a small matter to the business man who understands reserve funds and redemptions. To him, in fact, it represents merely a small addition to the yearly ground rent paid as consideration for the grant of the lease. At Letchworth, moreover, when the buildings do fall in, they will fall in to a trustee for the whole Letchworth community, so that the leaseholder, who seems to lose by the termination of his own lease, will, if he is still a resident, or the owner of some other lease, gain correspondingly by the termination of the leases of all his fellow-inhabitants of Garden City. Thus the tenure adopted gives great security to the tenant : it was, in fact, adopted because it was the most acceptable to him. It also gives to the company all necessary control over present and future building, and generally over all matters affecting the health and amenities of the estate.

How far, however, can we say that it secures the other great object with which we set out, namely, that the unearned increment should be retained as a fund to pay for public services for the benefit of the inhabitants ? I think we can say that in the main this object is attained also. We cannot claim to have retained the whole of the unearned increment, but I think we can claim to have retained the greater part of it : certainly enough to pay for many advantages for the inhabitants. It is true that already there is some increment of land value at Letchworth in private hands. The plots which we first let have certainly gone up to a value above that at which they were let ; but as the first lessees contributed very markedly to establish the town, it can hardly be said that the increment they have reaped on their plots was unearned by them. On the other hand their coming, and especially the coming of manufacturers, caused a rise in the value of surrounding plots, and when these were let subsequently, the rise went into the public coffer. As these further plots are let the value of still others goes up, and thus more of the unearned increment is reaped for the Letchworth public ; and this goes on increasing, so that on the

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plots in the centre of the town, many of which may not be let for some years to come, there will be a very large amount of socially created increment netted for the public.

I do not propose to discuss here how much, if any, of this socially created increment will be taken by the Chancellor of the Exchequer for the time being under the Budget increment tax. I will only say that when we have deducted that part of the increment which is exempt because it is attributable to the work and expenditure of First Garden City, Ltd., we contend there will be little or nothing on which the increment tax can be levied.

The question arises, however, whether in twenty years from now, when every plot of building land at Letchworth has been leased, there will not come a time when large amounts of unearned increment will be passing into the hands of private individuals. Twenty years hence the earliest of our leases will still have seventy years to run. There will, therefore, be a period of from seventy to ninety-nine years before the reversions fall in to the company, or its representatives. During that time there may be great changes in the money value of the land of the town, while the ground rents remain unchanged; such changes may be increases due to the discovery of minerals in some neighbouring district, to a general rise of prices all over the world, or to some quite unforeseeable change in the organisation of our industries; or of course the value of town sites may go down. These possible profits or losses, at Letchworth as elsewhere, stand at the risk of those who have taken the leases. That is, no doubt, regrettable, but it is almost impossible to see how it could have been avoided, unless the public had been willing to take the 999 years' leases revisable every ten years; or, on the other hand, to furnish First Garden City, Ltd., with capital enough to put up cottages and factories, which it might let to tenants for the comparatively short periods—a week, a year, seven, fourteen, or twenty-one years—which are usual in such cases. In the absence, however, of great discoveries or world-wide changes, I doubt whether any very large increase in the value of Letchworth sites is to be expected after the last building plots have been leased. It is true that no more building land will be available, and that will tend to put up the value of plots, but on the other hand the growth

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of the town will have ceased. As to increment in the value of Letchworth's agricultural belt, that will remain the property of the company and its successors, because the agricultural land is let on short tenancies.

Even now, if capital could be obtained, I should vastly prefer to see First Garden City, Ltd., itself building and letting some of the houses and factories, not only for the more rapid and more orderly growth of the town but also for the more complete retaining of the unearned increment. That may still come when, two years hence, the public realise that the investment is actually yielding dividends. Meanwhile, I think one may claim that what we have done regarding land tenure has gone a long way towards realising the ideals with which we set out, without sacrificing practical success. The second Garden City, when it comes, may be able to do better : it will have our experience to draw upon, and, let us hope, more than our money. Our duty was to prove that a Garden City could be built and could pay its way. We should not have done that by the most perfect of systems which remained merely a scheme upon paper.

ANEURIN WILLIAMS,
Chairman, First Garden City, Ltd.

APPENDIX B

THE PLANNING OF GARDEN CITY

THE planning of a new city on a large tract of agricultural land would at first sight appear to leave the utmost freedom to the designer ; but nearly always there are found, within the area, existing features which go far to determine the main lines of the scheme. Certainly this was the case at Letchworth. The estate consisted of three thousand eight hundred acres of undulating land with comparatively few level areas, situated on the Cambridge branch of the Great Northern Railway, which crossed from south-west to north-east, almost exactly bisecting the land. It was distant about $2\frac{1}{2}$ miles from the junction with the main line at Hitchin, where also there was communication with the Midland system by means of the branch line from Bedford. However much Letchworth itself might be expected at some date to outgrow the town of Hitchin, there appeared to be no likelihood that the importance of this main-line junction would diminish. Good communication by road with Hitchin Station was therefore an essential requirement.

The reservation of an agricultural belt all round the proposed town, which formed part of the Garden City scheme, and which required that the town area should be approximately in the centre of the estate, together with the position of the existing railway, fairly definitely determined that the proposed town must adapt itself to a line passing through its centre. The configuration of the area, both as affecting drainage and as providing suitable factory sites adjacent to the railway, confirmed this arrangement.

Other existing features which greatly influenced the planning were the Hitchin and Baldock Road on the south of the line, the Norton and Wilbury Road, of less importance, on the north, and the Icknield Way between them, all running approximately parallel to the railway. Although the Icknield Way had fallen out of

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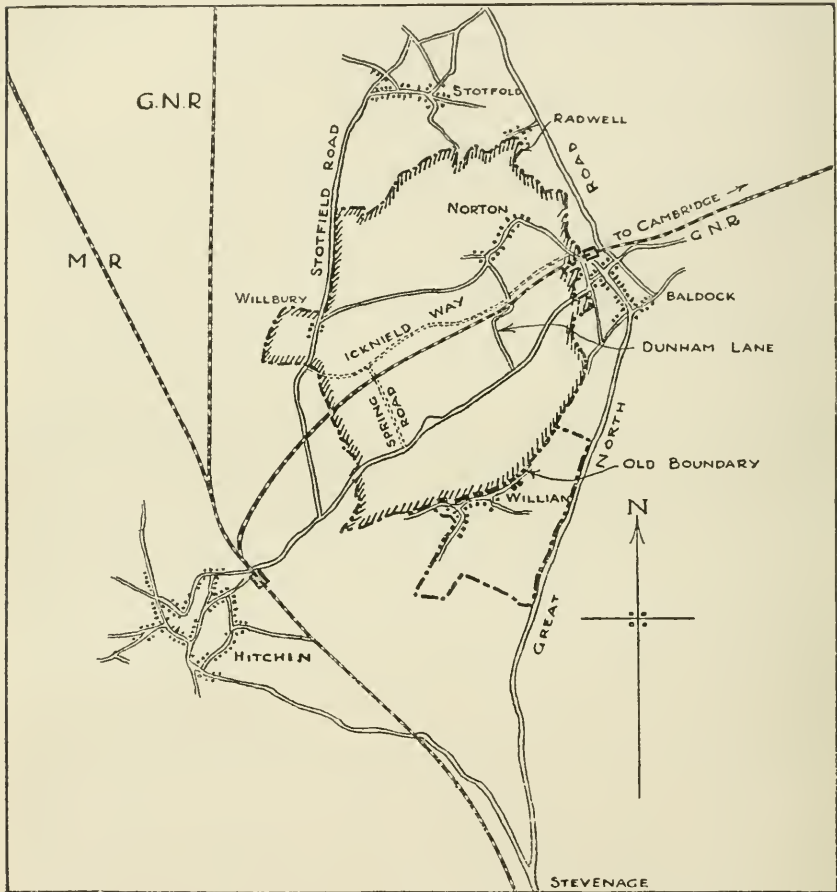
use except as a footpath and farm track, nothing but considerations of great importance to the success of the new town could have justified the obliteration of a road of such historic interest ; its origin is lost in antiquity, but it seems to have been one of the most important highways of the country before the advent of the Romans, so that its age must be counted in thousands of years. These three ways running from east to west were, therefore, accepted as forming parts of any scheme of roads to be devised.

In the opposite direction, from north to south, there was no road across the estate between Dunham's Lane on the east and the Stotfold Road which touches the estate at one point only on the extreme west, except a field track known as Spring Road connecting Letchworth Lane with the Icknield Way. A little to the east of the estate, however, lies the Great North Road, and a glance at a map of the neighbourhood shows that this important highway takes a considerable detour round the estate to pass through Baldock, and that some reduction in distance would result if a new highway were made across the Garden City area. In view of this possibility and the probable importance to Letchworth of the development of motor traffic, which was taking place at the time when the plan was made, it was felt to be desirable to provide a main highway across the estate connecting the Norton Road with Willian, and to make provision for extending this, if necessary, in the direction of Radwell. Already the acquisition by the Garden City Company of the new territory to the south of Willian brings Letchworth into touch with the Great North Road ; as the importance of road transit is still growing, the value of a link with this ancient highway may some day prove considerable. These considerations, as well as the requirements of internal communication, and the opportunity of passing under the railway afforded by the valley, determined the position and importance of Norton Way and Willian Way in the scheme of roads.

The other points where bridges could be conveniently constructed, either under or over the railway, practically fixed the positions where the frame of roads north and south of the line could be linked together. Apart from these connecting roads, the two areas were so effectually severed by the banks and cuttings of the railway that

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for all practical purposes it was necessary to plan them separately ; a fact which detracts somewhat from the unity which it is desirable that a plan should express.



Skeleton Plan of the Garden City Estate, showing the original Main Roads.

Having fixed the general position of the town and its relation to existing roads and railway, it became possible to consider the distribution of the various quarters ; and first we may mention

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that for the works and factories which were to form the economic basis of the town. Good communication with the railway and tolerably level ground, affording possible gradients for sidings and reasonably economical sites for buildings covering a large area, were essential ; a position relatively to the town favourable both from the point of view of convenience and of amenity was hardly less important. The prevailing wind in the district being from the south-west, in order to protect the town from smoke, smell, and noise, a position to the east or north-east was most desirable ; the land lying between Norton Way and Green Lane on each side of the railway was selected as the area most nearly complying with the conditions, and the goods station and yard were naturally located there also.

The great attractiveness of the Letchworth end of the estate, coupled with the short distance from there to Hitchin Station and the open outlook to the south-west, indicated this as one of the best areas for the residences of well-to-do people who would need for some years to depend largely on Hitchin Station, and for whom it would always be some advantage to be able readily to join the main-line trains there ; but good-sized plots for larger houses were arranged for in many other places, there being no intention on the part of the promoters to segregate all the houses of one size together.

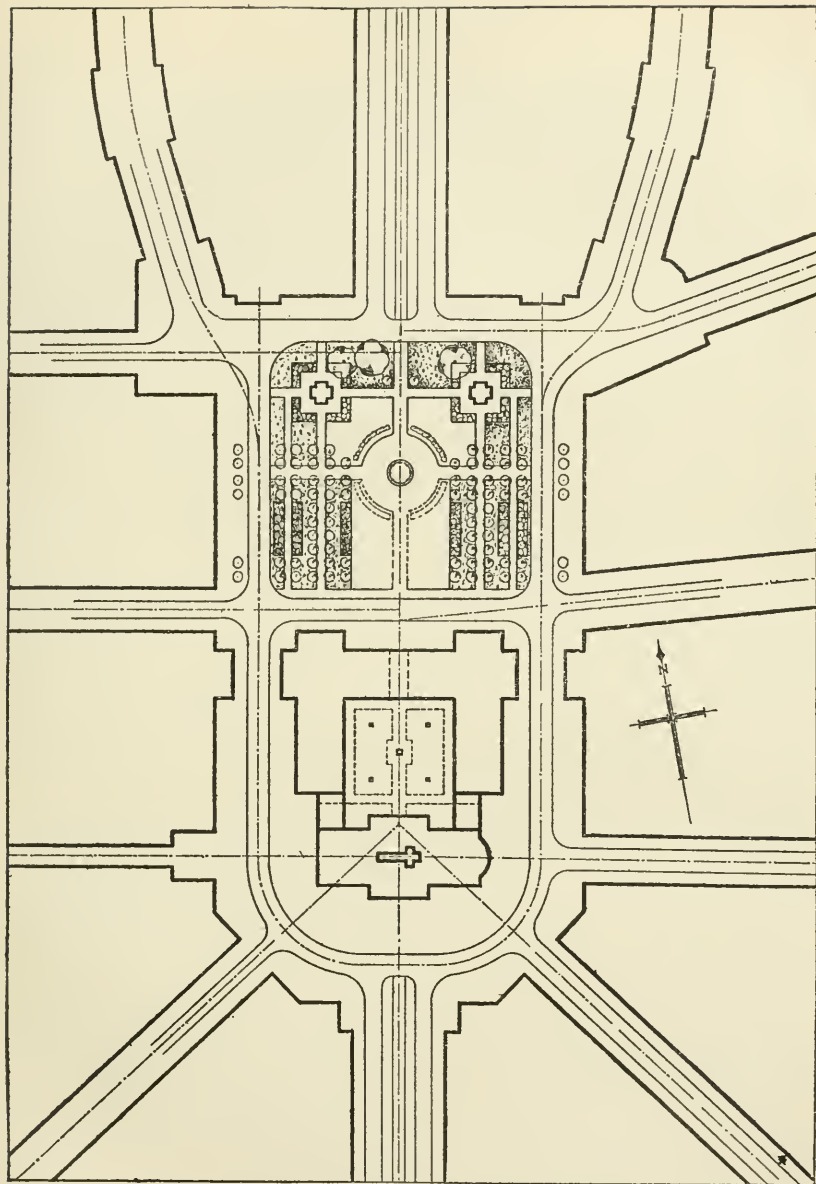
The interesting and beautiful old manor house of Letchworth Hall, with its finely-timbered grounds coming on the edge of the estate, was a most pleasing spot to reserve as a possible pleasure park ; and the great wealth of flowers and other wild growth, which gave a unique character and beauty to Norton Common, suggested that this area also should be reserved as a park within the town, and they accordingly took their places with other minor spots of beauty as existing features to be accepted and embodied in the plan.

The passenger station and the municipal and business centre of the town remained to be located before the general scheme could begin to take shape. It was fairly obvious that there would be some natural tendency for the town centre to locate itself around the railway bridge on the Norton Way, a position which was not, however, very suitable for the purpose. It consisted of a low and somewhat narrow valley largely filled with trees. To have

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developed a centre there would have meant the destruction of one of the few well-wooded spots within the town area ; the passenger station would have been perched up on an embankment, and the main public buildings would have been down in the hollow, where they would have been little in evidence. On the other hand, there was to the west of Norton Way an exceptionally fine position for laying out a town centre ; an almost level plateau, practically clear of trees, offered a site where the planning could be more spacious and less hampered by existing natural features, and where the group of public buildings which should form the centre of the town would adequately dominate the whole area. This site, moreover, was on the direct line between the residential area on the Hitchin Road and the best position for the railway station in the deepest part of the cutting, where also a bridge over the railway could be planned. It seemed best, therefore, to establish the Town Square on the best site, and to take what risk might be involved in overcoming the natural tendency in the early stages of development for the centre to gravitate to Norton Way. The railway company would have preferred that the passenger and goods stations should have been nearer together ; and there was a period when, had they considered only their own convenience and put their station against Norton Way, they could probably have upset the planning. That danger is now, happily, past ; the railway station is built in the position indicated on the original plan, and there is every reason to hope that the development of the town on the west will soon balance that on the east, and establish the town square as the most suitable and natural centre.

These main points settled, the actual planning could be commenced ; but for some time the general scheme took shape without any points or lines being so exactly determined as to anchor the plan definitely to the ground. The three old oak trees which stood out solitary in the central town area were very helpful in fixing exactly the axis line, which was set out to pass through this group of trees, and to cross Spring Road in the angle formed by the two lines of copse wood in such a way as to destroy as few as possible of the trees at that corner. When looking at those trees I often remember, with a feeling of gratitude to them, the day when, after tramping over the land for about a week and having the general



Plan of the Town Square, Garden City.

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scheme of lay-out largely developed in my mind, they suggested to me the exact position in which to stake out the axial line, and Mr. Bennett and I were able from this definite line to begin to lay the plan down on paper in the little cottage next to the post office at Letchworth Corner.

From the centre it was important to secure main roads radiating towards different parts of the town ; and the position was so favourably placed in relation to the remainder of the estate and the surrounding country that it seemed desirable to try and afford glimpses of the group of public buildings which would one day adorn that centre to those approaching the town from various directions, as well as to afford to those in the town glimpses of the country. These roads, with certain linking roads joining them together and giving facility for getting from one part of the town to another as well as to and from the centre, formed the bones or frame of the scheme ; the details more or less sketched in on the original plan were not regarded as final ; they will no doubt be further altered and improved as they have already been in many cases. The detached areas on the north side of the railway were also not planned with any idea of finality in the first scheme ; little was done beyond suggesting one or two of the probable main routes and the positions where it seemed desirable to develop small subsidiary centres which might eventually help to focus the life of the wards of the completed town.

Except in one or two places, there were so few existing trees on the town area that it was felt to be of very great importance to preserve as many as possible of these, and the regularity of the plan was somewhat sacrificed to this purpose, in some cases to an extent that would not have been felt to be wise had the future visitation of the elm beetle been foreseen !

A spacious square decorated with trees and gardens was thought to be a more appropriate centre for the First Garden City than a smaller, purely architectural *place* such as may be found in many continental towns ; and to ensure that it should become the actual centre of the life of the future city it was planned as the focus of the system of roads. This arrangement, while it tends to emphasise the centre and concentrate the life of the town there in a way that

Appendix B

was desired, entails perhaps some loss of the sense of enclosure and cosiness which are attractive features of the mediæval *place*. The roads are, however, brought into the square in such a way as to destroy the sense of enclosure as little as possible, consistent with its function as the centre of the road scheme. The majority of the streets lead up to the central group of buildings which were intended to form the dominating feature of the completed city. This central group was planned to consist of the municipal buildings and the church, typifying the administrative brain working under the influence of the inspiring spirit of the community to organise its civic life. It is to provide a suitable setting for this life that the city is called into being, and the main idea of the plan is to lead up to and emphasise this central fact.

But, although the centre and the main framework of roads dominate the planning, the greater part of a town consists of the dwellings of its citizens, and Letchworth came into existence mainly to express the new ideas as to housing which had gathered round the name of Mr. Howard and the Garden City Association. That every house should have its garden and should be so placed and planned that all its rooms should be flooded with light and sunshine, unblocked by other houses or by its own projections, were the main ideals. It was necessary to break away from the customary type of street with its endless rows of houses, cramped in frontage, hideous in appearance from the street, and squalid in the congestion of its back projections and its yards. The break was successfully made : the builders played up to the new ideals and a new standard in housing was established ; not without mistakes and excesses in various directions, it is true. What Mr. Punch calls " the promising hedge " hardly secured in some cases adequate privacy ; and the tidiness of some tenants did not reach the standard required by the degree of exposure to the public view ! Experience, however, is solving these problems. The great thing is that a new and vastly improved standard was set up and applied to the whole of a town in place of the deplorable one which had well-nigh become universal.

RAYMOND UNWIN, F.R.I.B.A.,
Consulting Architect to First Garden City, Ltd.

APPENDIX C

THE GARDEN CITY COMPANY

FIRST GARDEN CITY, LTD., is a joint-stock company incorporated under the Companies Acts, 1862-1900 (since substituted by the Companies (Consolidation) Act, 1908). The memorandum of association of the company is similar in most of its clauses to the memorandum of an ordinary commercial concern, with certain important exceptions.

The chief clauses in the memorandum are :

3. (a) To promote and further the distribution of the industrial population upon the land upon the lines suggested in Mr. Ebenezer Howard's book entitled *Garden Cities of To-morrow* (published by Swan Sonnenschein & Co., Ltd., in 1902), and to form a Garden City (that is to say) a town or settlement for agricultural, industrial, commercial, and residential purposes or any of them in accordance with Mr. Howard's scheme or any modification thereof.

(c) To found, lay out, construct, manage, and carry on any such Garden City as aforesaid, or any section or portion thereof.

(d) To pay upon the ordinary shares or stock of the company a cumulative dividend not exceeding 5 per centum per annum, and to apply any balance of profit after such payment as aforesaid to any purpose which the company or its directors may deem for the benefit directly or indirectly of the town or its inhabitants.

(o) Upon any winding-up or distribution of the assets of the company, except for the purpose of reconstruction, to apply for the benefit of the town or its inhabitants any balance remaining after

Appendix C

1. Repayment of the paid-up capital of the company.
2. Any sum required to make up a cumulative dividend of 5 per centum per annum thereon.
3. Any bonus not exceeding 10 per centum upon the amount paid up on the ordinary shares.

The articles of association contain the following important clause :

129. Subject to the rights of the holders of any debentures or shares entitled to any priority, preference, or special privilege, the net profits of the company, after providing for a reserve fund and for depreciation of the company's properties, shall be divisible by way of dividend among the members in proportion to the amount paid up on the ordinary shares held by them respectively, but so that the dividends upon the ordinary shares for any year shall not exceed the aggregate rate of 5 per centum per annum. The surplus of the net profits of the company, after payment of such dividends and any amount necessary to make up dividends for past years to the rate of 5 per centum per annum, shall be devoted to the provision of traffic facilities, water supply, lighting, drainage, markets, hospitals, libraries, baths, or otherwise for the embellishment of the town, the provision of means of education, recreation, or amusement for the people, or for any other purpose which the company or its directors may deem for the benefit of the town or its inhabitants.

First Garden City, Ltd., has an authorised share capital of £300,000, divided into 59,400 ordinary shares of £5 each and 3000 ordinary shares of £1 each. Although the company was registered nearly ten years ago the subscription list is still open, and is likely to remain open until the authorised share capital is fully subscribed. The directors went to allotment in September 1903 on 8000 (£40,000) £5 shares, and since, as a result of 152 allotments, the subscribed capital on September 30 last amounted to £181,026.

The Garden City

The following table shows the growth of the share capital for each year to the present date :

Date.						Total of Share Capital Subscribed.
						£
December 10,	1903	.	.	.	.	84,328 ¹
September 30,	1904	.	.	.	.	100,692
"	1905	.	.	.	.	127,927
"	1906	.	.	.	.	148,320
"	1907	.	.	.	.	155,861
"	1908	.	.	.	.	167,056
"	1909	.	.	.	.	172,046
"	1910	.	.	.	.	174,212
"	1911	.	.	.	.	175,446
"	1912	.	.	.	.	176,331
"	1913	.	.	.	.	181,026

The shareholders of the company number about 2400, and the list is very representative, comprising as it does members of the House of Lords and Commons, representing all shades of political opinion, bishops and high dignitaries of the Church of England, together with ministers of all denominations, manufacturers, merchants, proprietors and editors of newspapers, professors and fellows of the universities, authors, artists, workmen, and a large number of professional men, such as barristers, solicitors, engineers, and chartered accountants. The medical profession is also very largely represented.

Since October 1906 the company has issued 4 per cent. debentures of £50 each, secured on its floating assets, and redeemable in 1930. The interest on these debentures is paid half-yearly, and the total amount taken up at September 30, 1913, was £75,000.

In the first year the company had mortgages of £83,934, secured on the freehold of the land. These mortgages have been added to as the value of the estate has increased, and now amount to £158,442; of this amount part is secured on the gas, water, and electricity undertakings, and part has been advanced by the Lands Improvement Company for certain expenditure on water, sewerage, and highways capital accounts. The Lands Improvement Company is incorporated by Act of Parliament, and on the certificate of the Board of

¹ This amount includes £20,278 allotted to members of the Pioneer Company.

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Agriculture advances money to landowners to effect improvements on their land. The loans are repayable over periods of from twenty-five to forty years.

The total amount of money raised by the company under various headings, from year to year, is shown in the following table :

Date.		Share Capital.	Mortgages and Loans.	Debentures.	Total.
		£	£	£	£
September 30, 1904	. .	100,692	83,934	—	184,626
"	1905 . .	127,927	91,891	—	219,818
"	1906 . .	148,320	95,324	16,200	259,844
"	1907 . .	155,861	96,946	34,250	287,057
"	1908 . .	167,056	102,137	42,700	311,893
"	1909 . .	172,046	112,487	48,750	333,283
"	1910 . .	174,212	115,929	59,650	349,791
"	1911 . .	175,446	128,811	66,550	370,807
"	1912 . .	176,331	134,646	71,950	382,927
"	1913 . .	181,026	158,442	75,000	414,468

The expenditure of the company on land and buildings, on the development of the town, and on the provision of public services is shown in the two following tables :

TABLE SHOWING THE EXPENDITURE ON THE ESTABLISHMENT OF GAS, WATER,
AND ELECTRICITY WORKS, ETC.

(Extracted from the Audited Accounts.)

Year.	Waterworks.			Gasworks.			Electricity.			Swimming Bath.			Total.		
	£	s.	d.	£	s.	d.	£	s.	d.	£	s.	d.	£	s.	d.
1904	3,272	0	3	110	7	8	—			—			3,382	7	11
1905	12,894	5	10	3,797	17	2	—			—			16,692	3	0
1906	15,641	3	3	11,293	16	1	—			—			26,934	19	4
1907	16,479	5	7	16,332	1	8	4,554	0	10	—			37,365	8	1
1908	19,571	19	0	23,019	15	7	6,467	11	3	434	11	9	49,493	17	7
1909	20,454	8	1	24,699	10	6	6,611	4	2	462	1	2	52,227	3	11
1910	21,123	18	8	26,813	12	8	8,530	0	10	482	16	0	56,950	8	2
1911	21,787	0	0	34,529	18	4	14,290	2	3	454	0	11	71,061	1	6
1912	26,183	10	8	38,644	15	3	21,501	10	4	485	18	1	86,815	14	4

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TABLE SHOWING THE EXPENDITURE OF THE COMPANY ON LAND AND DEVELOPMENT.
(Extracted from the Audited Accounts.)

Year.	Land and Buildings.	Highways.	Sewerage.	Parks, Open Spaces, etc.	General Development.	Total.
	£ s. d.	£ s. d.	£ s. d.	£ s. d.	£ s. d.	£ s. d.
1904	154,972 2 9	3,157 17 8	136 11 2	232 11 1	1,686 14 9	160,185 17 5
1905	158,547 7 2	12,219 14 5	4,781 0 0	951 6 5	2,722 1 4	179,221 9 4
1906	166,856 0 2	17,596 11 8	9,528 8 7	1,207 2 6	3,933 19 9	199,122 2 8
1907	171,392 8 6	24,395 2 9	13,205 17 5	1,447 17 2	5,476 19 4	215,918 5 2
1908	172,913 16 4	28,327 4 7	14,475 6 10	1,467 0 10	7,745 19 1	224,929 7 8
1909	174,377 6 2	32,141 19 7	15,559 3 10	1,540 1 7	9,697 14 7	233,316 5 9
1910	175,369 2 11	34,371 11 4	16,349 6 10	1,632 6 0	10,807 3 6	238,529 10 7
1911	175,988 11 7	41,092 19 5	17,133 16 5	1,767 11 8	11,619 8 7	247,602 7 8
1912	179,945 1 0 ¹¹ / ₂	44,938 12 3	18,127 14 1	1,856 16 5	16,067 4 7	260,935 8 4

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A further table shows how the actual receipts have increased from year to year :

TABLE SHOWING RECEIPTS FROM RENTS AND OTHER SOURCES.
(Extracted from the Audited Accounts.)

Year.	Farm, Residential, and other Rents.	Ground Rents.	Profit on Water Works.	Profit on Gas- works.	Profit on Electricity Works.	Sundry Receipts.	Total.
	£	£	£	£	£	£	£
1904	3,874	—	—	—	—	148	4,022
1905	3,814	246	70	—	—	984	5,114
1906	3,468	1,356	168	—	—	1,267	6,259
1907	4,423	2,123	308	290	—	1,164	8,308
1908	4,619	2,990	544	808	—	1,316	10,277
1909	4,487	3,574	588	987	—	1,100	10,736
1910	5,278	4,100	653	1,359	—	1,091	12,481
1911	5,273	4,581	837	2,149	22	1,615	14,477
1912	5,404	5,249	1,025	2,660	624	1,462	16,424

A final table states the balances on the general revenue and expenditure account :

TABLE SHOWING THE YEARLY BALANCES ON THE REVENUE ACCOUNT.
(Extracted from the Audited Accounts.)

Year.	Balance on Revenue Account before charging Interest on Mortgages and Debentures.			Amount of Interest paid on Mortgages and Debentures.			Net Balance on Revenue Account.		
	£	s.	d.	£	s.	d.	£	s.	d.
1904	439	8	9 (profit)	3,419	8	5	2,979	19	8 (loss)
1905	1,136	7	8 (loss)	3,596	0	1	4,732	7	9 (loss)
1906	1,469	11	9 (loss)	4,106	4	4	5,575	16	1 (loss)
1907	1,516	11	11 (profit)	4,850	1	10	3,333	9	11 (loss)
1908	915	16	8 (profit)	5,567	3	9	4,651	7	1 (loss)
1909	2,395	19	9 (profit)	6,088	12	6	3,692	12	9 (loss)
1910	4,875	15	2 (profit)	6,551	16	4	1,676	1	2 (loss)
1911	7,349	13	1 (profit)	7,174	19	1	174	14	0 (profit)
1912	10,954	12	10 (profit)	7,868	0	8	3,086	12	2 (profit)

In 1907, after taking the highest legal advice, the directors decided to have a valuation made of the estate, and Messrs. Drivers, Jonas & Co., of Pall Mall, and Mr. H. Trustram Eve, of Bedford, were commissioned to make this valuation. After making a careful

The Garden City

survey of the whole property, occupying some months, they reported to the directors that, in their opinion, the value of the land and the buildings on it belonging to the company was £379,500. Credit was, therefore, taken for this amount in the company's accounts. The total amount of capital expenditure on the estate, including the price paid for the property and the cost of the gas works, water works, electric works, highways, sewerage, parks, open spaces, improvements to buildings, etc., was, up to the date of the valuation, £247,806 13s. 11d. The valuation, therefore, showed an appreciation of £131,693 6s. 1d. in the company's property over and above such capital expenditure. From this amount the directors wrote off a sum of £34,645 19s. 10d., made up of £12,547 7s. 1d. preliminary and prospecting expenses, £5476 19s. 4d. general development, and £16,621 13s. 5d. general revenue and expenditure account. This left a balance of £97,047 6s. 3d., representing the net increment in value of the estate above all that it had cost. To this net increment should be added, as before indicated, an unascertained amount for the value of the timber, gravel pits, and commercial undertakings mentioned above.

As the valuation is of some interest the chief part of the valuers' report is given hereunder :

To the Directors, First Garden City, Ltd.

GENTLEMEN,—In accordance with your instructions, we have made a careful and detailed survey and valuation of your estate at Letchworth, Herts., known as "The Garden City." . . . We are much struck with the ingenuity and wisdom which is apparent in the planning. The diverse plans for grouping cottages—the wide roads—and the general scheme for plenty of fresh air for each house are quite unique and on unconventional lines, and are evidently the conception of an original and broad mind. We were very pleased with the progress of development, which cannot have been equalled in any other building estate in England, and the whole scheme has been carried out with a persistent effort that has mainly assured the success of the undertaking.

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The building and town areas have been raised from agricultural value to building value by the earliest development—this building value has further been increased by the rapid accretion of the varied population and factories brought here, and as these increase they must further enhance the value of the undeveloped land.

In our valuation we have in no case taken future increase of value into consideration, but by deferring *present values* have arrived at figures which are more likely to be increased than diminished as development proceeds.

The zone of agricultural land known as “ The Agricultural Belt ” must gradually acquire an accommodational value as the population of the central area increases. Every opportunity has been taken of splitting up large farms into small-holdings as they have fallen in hand, and the map of the estate coloured in holdings shows that as much as possible has been done in this direction. This policy can easily be continued as opportunity offers, but it cannot be forced.

Since the estate was purchased, we are informed that the copyholds have been enfranchised, the land tax redeemed, and the whole estate is freehold. Some fourteen acres have been sold to the railway company for a goods yard, two acres have been made over to the county council for educational purposes, but with these exceptions the development has proceeded by the creation of ground rents for 99 years, and in a few cases for 999 years at revisable rents, freeholds only being sold to representatives of religious bodies, and this method will continue. Ground rents vary from £10 per acre to £120 per acre, and in one case of £150 per acre, while £30, £40, and £60 per acre is obtained in large numbers of cases, the rent varying according to position.

We were surprised to find that 815 buildings have actually been erected in the short space of three years on ground leases. . . .

The company owns the gas works, water works, and electricity works, the capital expenditure on which amounts to £38,321. Although these are in excess of present require-

The Garden City

ments, we have added nothing in respect of these, but they represent a valuable asset and their future value will be very large. The town of Baldock is to be supplied with water by the Garden City Company, and here again we have omitted this asset in our valuation. . . .

Nothing has been included for timber on the estate, the value of which is considerable.

There are also valuable beds of sand and gravel, which have already produced a handsome revenue, but we have omitted these from our valuation.

The outgoings of tithe (£631 17s. 3d. computed value) and rent charges (£11 1s. 2d.) have been deducted at the sum for which they could be redeemed.

We have, in making our valuation, accepted throughout the plans and schedules handed us by the estate office as being correct.

We are of opinion that the value of the estate, made up of ground rents on developed land together with the present value of the undeveloped land and the agricultural belt and including the buildings which are the property of the company, is THREE HUNDRED AND SEVENTY-NINE THOUSAND FIVE HUNDRED POUNDS (£379,500).—We are, gentlemen, your obedient servants,

H. TRUSTRAM EVE,
Chartered Surveyor,
45, Parliament Street, Westminster,
Bedford, and Hitchin.

DRIVERS, JONAS & Co.,
Chartered Surveyors,
23, Pall Mall, S.W.

November 26, 1907.

At September 30, 1911, this valuation was confirmed, and the directors wrote off against the increased value certain expenses, including the adverse balance on the general revenue and expenditure account to date, amounting altogether to £20,452 19s. 9d.

Appendix C

The manner in which the company dealt with its expenses was considerably revised in the accounts to September 30, 1912. The paragraphs in the directors' report (dated January 21, 1913) in which this revision is explained are sufficiently interesting to be quoted at some length :

The directors beg to submit herewith the audited accounts of the company for the year ending September 30, 1912. It will be seen that the net profit of the company for the year is given as £3086 12s. 2d.; for the year previous a net profit of £174 14s. was shown. It is, however, only right at once to point out that the two figures do not correspond, inasmuch as there has been this year a very important change in the presentation of the company's accounts. Shareholders will remember that, in the first seven of the nine years of the company's operation, the accounts showed net losses on revenue account ; but the directors always maintained that these losses were only apparent, inasmuch as they were far more than counterbalanced by the increased value of the estate. This year the directors, with the concurrence of the auditors, and fortified by the legal opinion of Sir Francis Palmer, the eminent authority on company law, have written to development account certain considerable expenditure, amounting to £2354 2s. 10d., which, according to the system of accounts followed in previous years, would have been charged against revenue. These items were not incurred for the purpose of carrying on the estate as a going concern, but with the view to its future development. In the early years of the estate it was probably wise to charge such items to revenue account, but now that the future of the estate is beyond doubt, it would be an excess of caution to continue to do so, and would only give a false view of the result of the company's operations. It would, in fact, be robbing the revenue account each year, in order to build up an ever-increasing surplus of assets over liabilities. That surplus, it will be remembered, is already £76,594, as shown by the valuations of 1907 and 1911.

It is, however, the intention of the board, before paying any

The Garden City

dividend, to have a re-valuation of the company's property made, and if that re-valuation—as they confidently expect—shows a further increment of value produced by their operations, in addition to the increment shown in 1907 and confirmed in 1911, they will write off the development account against part of such new increment, and then proceed to pay a dividend out of the accumulated profits of revenue account. The directors hope to be able to fulfil the expectation held out in their last report by paying a dividend of $2\frac{1}{2}$ per cent. on shares in two years from the present time, possibly even sooner.

In an ordinary trading company it is comparatively easy to keep expenditure on capital account distinct from expenditure on revenue account; in the development of a new town the problem is more complicated. Besides expenditure represented by bricks and mortar, and other tangible things, there is much expenditure necessary for development, which, while yielding an increase in capital value, is not represented by additions such as buildings. This kind of expenditure is properly dealt with by putting it to a development account, and writing it off when it has been proved by a re-valuation that it was wisely and profitably made. The company has, of course, always had such a development account; the only difference is that the point has now been reached when the caution shown in the past would be unnecessary and undesirable. The directors have contemplated some such change as the above for several years, and they are satisfied that the net profit now shown does not in any way overstate the actual profit of the company during the year, but, on the contrary, is well within the facts, seeing that they have still charged to revenue account considerable sums which have been expended for the purpose of developing the estate and which, therefore, they might have charged to development account, according to the legal advice they have received.

The extract from the report is sufficiently explanatory to make further comment unnecessary.

At the present time the directors of the company are : Aneurin

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Williams, J.P. (chairman); F. S. Bowring (Col.), C.B., R.E.; Edward Cadbury, J.P.; John E. Champney, J.P.; Henry B. Harris; Ebenezer Howard, J.P.; T. H. W. Idris, J.P.; L. R. King; R. Neville; Howard D. Pearsall, M.Inst.C.E.; Edward T. Sturdy; and Franklin Thomasson, J.P.

In addition to the above the following gentlemen have at different times acted as directors: The Hon. Mr. Justice Neville (first chairman, 1903 to 1906, who resigned upon his appointment as one of His Majesty's judges); Sir William Lever, Bart.; The Right Hon. Earl Brassey; T. P. Ritzema, J.P.; R. A. Yarborough, M.P.; and R. R. Cory.

Provision is made in the articles of association for directors' remuneration, but with the exception of Mr. Ebenezer Howard, who receives a modest honorarium, the directors have given their services to the company. Although they receive no fees this does not lessen the time and attention they devote to the company, and a large number of meetings are held during the year. The business of the company is controlled by three standing committees of the board: finance, building and letting, and engineering; with *ad hoc* committees for special matters which arise from time to time. In addition to the meetings of the directors a consultative council of shareholders is held three times a year, consisting of thirty shareholders appointed at the annual meeting of the company, half of them being residents of Letchworth. The operations of the company cover a wide area and many different undertakings. In addition to being the ground landlord, the company provides and manages the gas, water, electrical, and sewage disposal works, has its own gravel and sand pits, constructs its own roads and buildings, manages farms, a hotel, a public omnibus, and swimming bath, and maintains open spaces. It also passes plans and inspects all new buildings. The administration is conducted from one office, and the staff, it is hardly necessary to say, includes many highly-trained men. Men who have received a large part of their training and experience in the company's office are already occupying important positions in this country and abroad.

HAROLD CRASKE,
Secretary to First Garden City, Ltd.

APPENDIX D

THE PUBLIC SERVICES OF GARDEN CITY

THE engineering department of Garden City takes an important place in the company's operations, being responsible for the bulk of the money spent. The development of a town on an entirely new area is a matter of very considerable engineering interest, and when the size and disposition of the town has been previously determined so that the engineers know exactly what they have to work to, that interest is increased. At Garden City the lines upon which the town was to be developed and the scheme of public services were, as far as possible, drawn up at the beginning, so that the public services have grown with the growth of the town. It need hardly be said that it has been an essential part of the scheme so to develop the Garden City as to include modern conveniences from the commencement.

In writing on engineering it is usual to make a few remarks on the geological composition of the land of the district. The subsoil over the larger area of the Garden City Estate is chalk with occasional deposits of boulder clay, and here and there small areas of gravel and sand (see Plate I.). The average height above sea-level is 300 feet. The total area is 4500 acres, of which the actual town will occupy between 1200 and 1500 acres, the remainder being reserved for the agricultural belt.

It is the central or town area with which the public services are mainly concerned, although water and gas have been conveyed to the villages on the outskirts, and their drainage improved.

The population at present is about 8000, but the engineers, in their plans and designs, have had to anticipate the future requirements of over 30,000 people. This has made estimating somewhat difficult, it being necessary to look at the proposals from the constructive as well as the financial point of view.

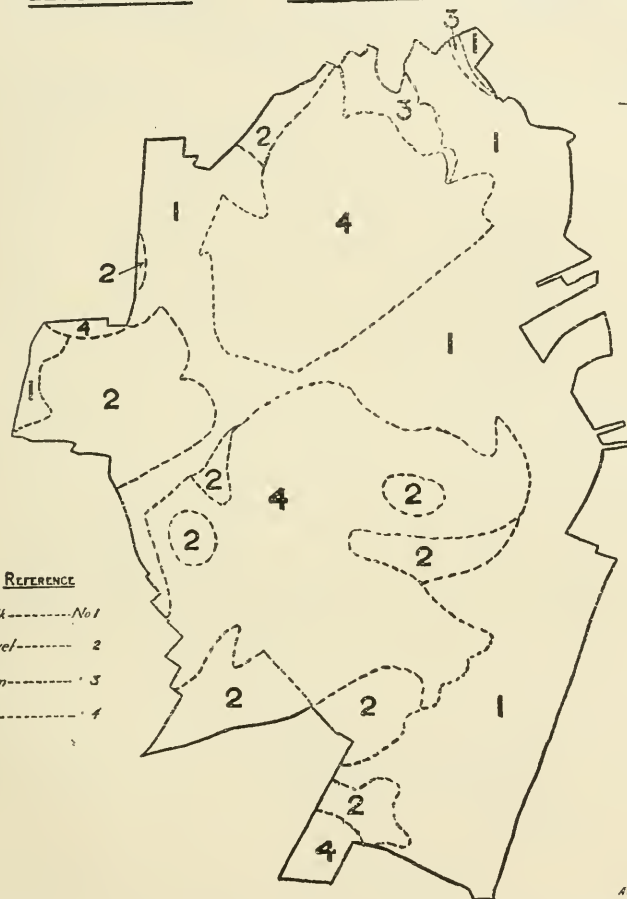
The public services, such as the water, gas, and electricity supplies,

GARDEN CITY

PLATE I

LETCHWORTH

GEOLOGICAL FORMATION

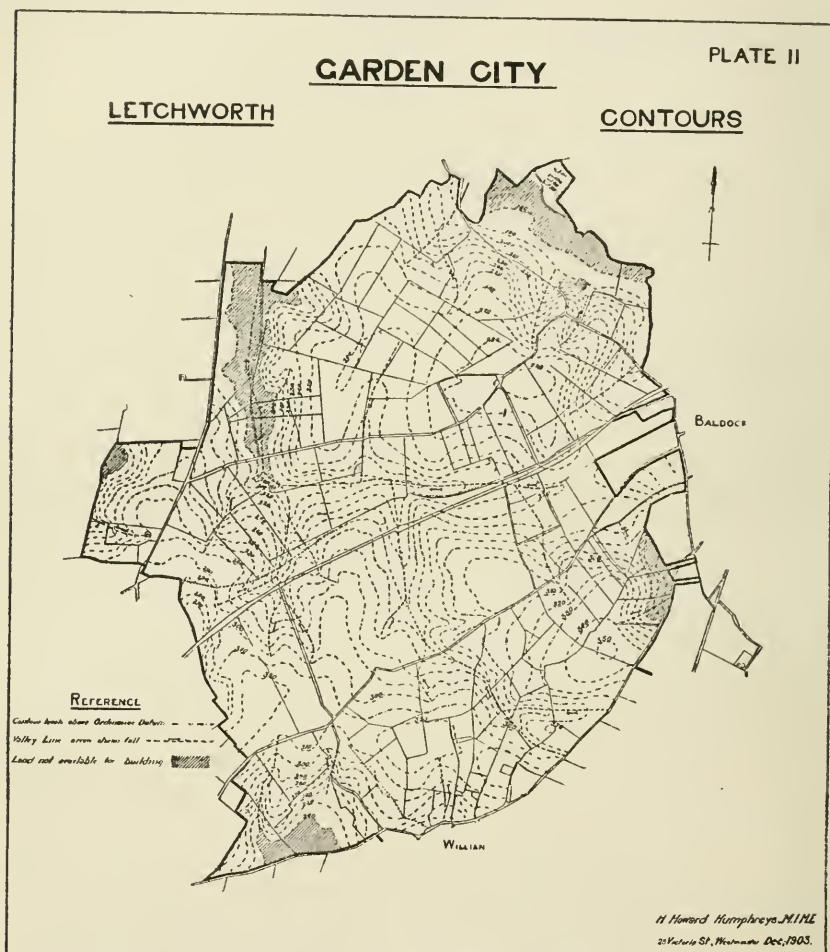


AWE Bullmore, A.M.I.C.E.
Engineer May 1913

Plan showing the Geological Formation of the Garden City Estate.

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have had to be dealt with economically to make the outlay remunerative at rates not higher than those charged in other towns where the consumption per mile of frontage is higher.



A Contour Map of the Garden City Estate.

When it is considered that in about ten years a population of 8000 people has been located on an area hitherto agricultural land, that roads, sewers and sewage farms, waterworks and mains, gas

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works and mains, electrical works and cables, and railway sidings have been constructed, and that on the gas, water, and electricity undertakings a reasonable return has been obtained, it will be conceded that the public works have been carried out with some success by the committee of directors (of which Col. F. S. Bowring, C.B., R.E., is chairman) and the company's staff.

When purchasing the estate the company decided as an initial step to secure "spot levels." It was soon realised that the only way to obtain accurate and definite knowledge upon which to base a satisfactory laying out was to have the whole estate carefully contoured to differences of level of a few feet. The contours were run at 5-foot levels, and this work was entrusted to Mr. Howard Humphreys, the writer being at that time his chief assistant.

Articles have recently appeared in technical papers warning engineers and surveyors against attempting town-planning without first having a careful and accurate survey made with levels and contours, and that warning gains added emphasis from the engineering experience at Garden City. A comparatively few pounds spent in preparing a comprehensive topographical plan will ensure a considerable saving when designing work, and allow the engineer to take advantage of the natural features of the land, which a bare survey with a few isolated levels would not do.

The contour lines, as will be seen with reference to Plate II., enable the valleys, hills, and general formation of the ground to be seen at once ; and as economic sewerage, road-making, and surface drainage depend on suitable levels and gradients, and as water and gas works and mains require proper placing to ensure their respective pressures, the importance of accurate levels is enhanced.

The actual work of contouring occupied several engineers about four months, and necessitated running some 187 miles of sections.

WATER WORKS

After the contour plan was completed, and the main lines of the town plan had been settled by the architect, the first consideration was the provision of a water supply. Early in 1904, the late Mr. G. R. Strachan, M.Inst.C.E., was instructed by the company

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to prepare a water-supply scheme. With the exception of Hitchin, three miles to the south-west, there were no water supplies in the vicinity of Letchworth, and the levels of the Hitchin reservoir did not command many parts of the Letchworth area, had it been desirable to obtain water from that source.

The River Ivel (or, rather, stream), to the north of the estate, passing through Radwell, skirts the limit of the chalk beds dipping south and running under the London beds or basin. Beyond the Ivel the gault and greensands outcrop, underlying the chalk. Constant springs outcrop at Norton Bury Farm and Baldock, which feed the large trout hatchery at Radwell. Although the tendency of the water thus thrown up is to gravitate south towards the London basin, its passage would appear to be retarded, probably by faults in the chalk.

The ground-level of the pumping station is 300 feet above sea-level, the water in boreholes standing at 90 to 100 feet below this ground-level, according to the season.

After careful consideration of the geological formation and direction of drainage of the estate, it was decided to locate the first borehole on the north of the Baldock Road (Mr. Strachan in his first report had indicated the position), and if a suitable supply was obtained, to erect the pumping station, and place the reservoir on the Weston Hills, about a mile away.

A 16-inch diameter borehole was sunk to a depth of 220 feet below the surface-level, and tested up to 6000 gallons per hour. The reduction in level was so small during the test that a plant to raise double this amount was installed. It must be remembered that no houses had been built at that time, and as it was impossible to foresee with what rapidity the town would grow, this supply was considered sufficient *pro tem*. The belief that the bore had tapped a strong water-bearing strata has been fully borne out by the yield from two more wells sunk within a short distance of the first.

The water at Letchworth is not hard for a chalk water, and this is attributed to the fact that the water has not been long held up before being pumped out.

The yield being satisfactory a reservoir was constructed on the Weston Hills to hold 250,000 gallons, and a pumping engine and

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pumps were erected. The engine was of the suction gas type, the pumps consisting of a borehole pump which lifts the water from the bore into a tank at the engine-room floor-level, from which it is taken by high service plunger pumps and forced to the reservoir. The borehole pump is 150 feet below floor-level, and from floor-level to reservoir-level is an additional 165 feet, making the total lift 315 feet. The top water-level in reservoir is 465 feet above sea-level.

In 1907, when the consumption had increased and the neighbouring town of Baldock included in the supply, it was necessary to duplicate the plant. A second bore of the same diameter as No. 1 was sunk, and on test excellent results were obtained. The pumps are a duplicate of No. 1 bore, but the electricity supply station having then been started, electrical power pumps were installed instead of a gas engine as on the No. 1 plant. These plants, one erected in 1904 and one in 1907, have continued to supply Letchworth and Baldock up to the present time.

The following table shows the annual water consumption :

1905	.	.	.	.	.	.	10,000,000	gallons
1906	.	.	.	.	.	.	16,000,000	"
1907	.	.	.	.	.	.	22,000,000	"
1908	.	.	.	.	.	.	34,000,000	"
1909	.	.	.	.	.	.	41,000,000	"
1910	.	.	.	.	.	.	53,000,000	"
1911	.	.	.	.	.	.	70,000,000	"
1912	.	.	.	.	.	.	85,000,000	"

and 1913 bids fair to have a proportional increase.

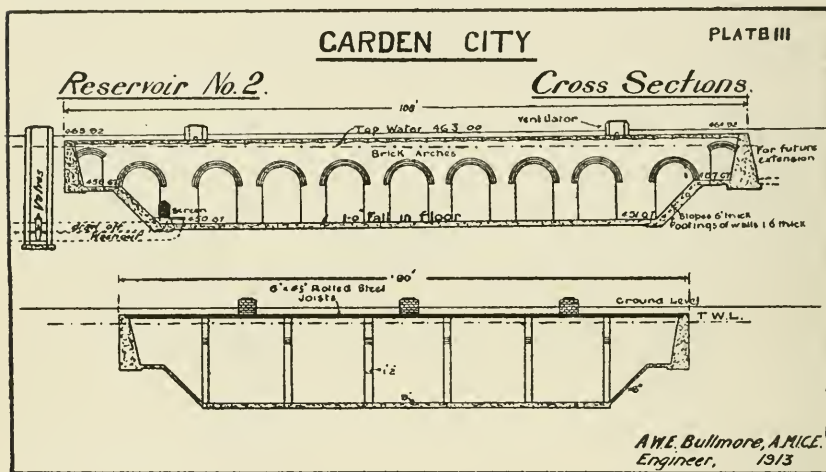
The mains laid vary in size from 12 inches to 3 inches, and the total laid at the end of each year is as follows :

1904	.	.	.	.	.	.	5	miles
1905	.	.	.	.	.	.	12	"
1906	.	.	.	.	.	.	15	"
1907	.	.	.	.	.	.	15 $\frac{3}{4}$	"
1908	.	.	.	.	.	.	16 $\frac{3}{8}$	"
1909	.	.	.	.	.	.	17 $\frac{1}{2}$	"
1910	.	.	.	.	.	.	18 $\frac{1}{2}$	"
1911	.	.	.	.	.	.	20	"
1912	.	.	.	.	.	.	21	"

Early in 1912 a third borehole was put down and the reservoir capacity added to.

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The third borehole is 24 inches in diameter, as against 16 inches in the earlier two ; it is 210 feet below ground-level, and all three bores are within 60 feet of each other. It was tested by constant pumping with a temporary pumping plant for seven days and nights. While 50,000 gallons per hour were being lifted, the level of water was reduced by about 40 feet, and on reducing the draw to 40,000 gallons per hour was much less ; on ceasing pumping the water rose immediately 39 feet, and in six minutes to the normal rest-level.



A Section of one of the Garden City Water Reservoirs.

The results of the test are so satisfactory that a plant capable of discharging 40,000 gallons per hour into the reservoir is being proceeded with, and there is little doubt that sufficient water can be obtained to meet the full ultimate needs of the town from the present pumping station site.

The new No. 2 reservoir has a capacity of 500,000 gallons, and being very similar in design to No. 1, a general description of the former will suffice for both. The ground in which it is built consists of hard chalk, and the roof being at ground-level all the walls, except the dividing one, have a solid backing.

With the exception of the roof (constructed in reinforced con-

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crete) and the six longitudinal walls and brick arches carrying the roof, the reservoir is built entirely of six to one concrete. The dimensions are 108 feet by 90 feet by 12 feet deep, as shown in the section, Plate III. The sides slope back from the floor at 45°, being 6 inches thick, then there is a level berm on the east and west sides 3 feet 9 inches wide, and on the north and south sides 6 feet wide. The upper portion is a retaining wall, 8 feet high, with battered face. At the north end of the reservoir, and for a short distance along the west side, the wall (as shown in the section) has two battered faces, and is made strong enough to withstand the water pressure when filled up to top water-level on either side and empty on the other. The object of this is to form a dividing wall between the present and a future reservoir. The roof is of four to one concrete jack arches, reinforced by rolled steel joists, these joists being carried on the before-mentioned brick arches.

The interior is lined with natural rock asphalt, the roof also having a covering of the same material. The floor of the reservoir has a slope of one foot in its length, allowing solid deposit to be removed easily by means of the wash-out pipes. No iron has been allowed to come into contact with the water except the inlet and outlet pipes, which have been specially coated with non-corrosive material.

The total capital spent on the water undertaking to September 30, 1912, was £26,183, and about £7000 is now being spent in equipping the No. 3 well, besides further outlay on new mains as the development of the town proceeds.

GAS WORKS

In considering the supply of light and heat for the town the relative advantages of gas and electricity were carefully debated, and owing to the fact that it was impossible, on a scattered development, to establish both services on a paying basis, and that electrical cooking and heating was, at that time at any rate, in its infancy, the company decided first to instal gas works to provide light, heat, and power for the houses and factories.

The Garden City

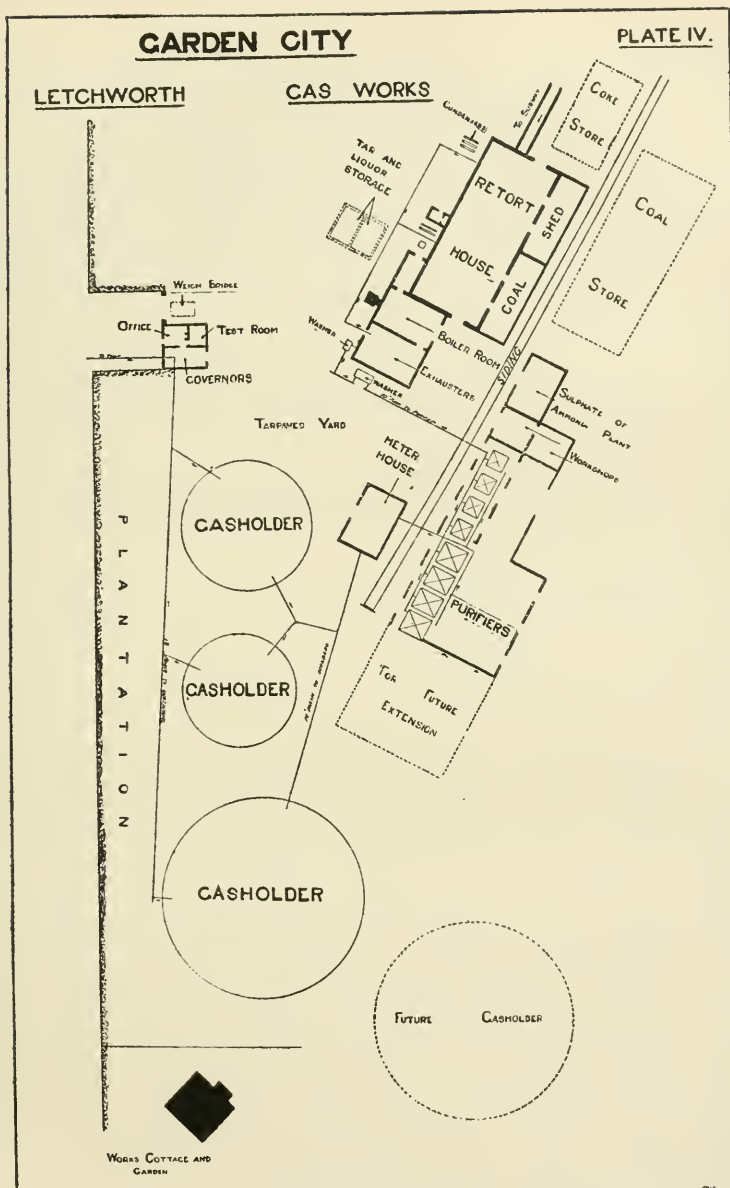
Mr. Charles Hunt, M.Inst.C.E., a well-known gas engineer, was called in to design the works.

It was thought that in providing a plant to supply 6,000,000 cubic feet per annum liberal allowance would be made for the immediate requirements of the town and for the near future, while arrangements were made for extension as and when required.

The erection of the works was commenced early in 1905, and they were complete and producing gas in September of that year. The plant consisted of two beds comprising eight retorts, a brick and slated retort house with space for four additional beds, a gas engine driven exhauster, a gravitation washer, a set of two 8-feet square purifiers, a station meter in separate building, and one lift gas-holder, 52 feet diameter, 27,000 cubic feet capacity, with provision for telescoping, the tank being of concrete in hard chalk foundation. About 9 miles of mains were laid, the largest being 6 inches in diameter. The first full year of working, viz. 1906, showed an output of 5,000,000 cubic feet, and with the advent of factories the consumption went up so rapidly that in 1907 it had increased to 12,000,000 cubic feet, which, hardly before the ordinary work of manufacture could settle down, necessitated the doubling of the works. During the intervening period the officials had a somewhat anxious time, the chief difficulty being that the factories consumed so much in the daytime that the holder could not be filled quickly enough to cope with the night load. A new holder was put in hand of 62 feet diameter (in two lifts), of 100,000 cubic feet capacity, two more beds of six retorts each, and a larger exhauster and engine. The consumption, however, went merrily on, and at the end of the next year, 1908, had risen to 22,000,000 cubic feet, necessitating the telescoping of the first holder and further additions of plant. In September 1909 the output had risen to 26,000,000, and it was necessary to arrange for a considerable enlargement of the works. The existing retort house was extended by doubling its length and four new beds of eight retorts each were installed.

In 1910 the output of gas had increased from 26,000,000 to 32,000,000 cubic feet, and in 1911 to 40,000,000. During 1910-1911 new exhauster engines and boilers were installed.

With 40,000,000 cubic feet output the station meter and holder



A Plan of the Gas Works.

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accommodation again required enlarging, and in September 1912 a further gasholder of 102 feet diameter, with 300,000 cubic feet capacity, was commenced. This is now complete, increasing the storage to 450,000 cubic feet. A new station meter and house have also been added and new and larger works-connecting mains. The first works-mains were 8 inches in diameter; the new ones are 16 inches, or about four times the capacity of the original mains. A sulphate of ammonia plant has been erected to deal with 100,000,000 cubic feet per annum.

Additional distributing mains are continually being laid, and the total length is now between sixteen and seventeen miles. The first trunk-main was only 6 inches in diameter; the additional one is 14 inches.

The following figures show that the increase of gas consumption has been phenomenal. The proportion of daylight output is also believed to constitute a record :

In 1906 the output was	5,000,000					
In 1907 " " "	12,000,000	of which the daylight consumption was				58.9 p.c.
In 1908 " " "	22,000,000	"	"	"	"	54.9 p.c.
In 1909 " " "	26,000,000	"	"	"	"	57.5 p.c.
In 1910 " " "	32,000,000	"	"	"	"	56.8 p.c.
In 1911 " " "	40,000,000	"	"	"	"	55.7 p.c.
In 1912 " " "	50,000,000	"	"	"	"	63.2 p.c.

This large daylight consumption is due to the quantities used by the factories and the very high percentage of gas stoves in use in private houses compared with other towns. If it were not for this the undertaking would not pay as well as it does, if at all, because, owing to the development on what is now known as Garden City lines, with the houses spaced well apart, the mileage of mains to output is large. In many of our large towns the consumption per mile of mains is between 5,000,000 and 6,000,000 cubic feet; in Letchworth it has only now reached about 3,000,000. This shows that, although the price for gas for domestic purposes is only 3s., and for power purposes as low as 2s., the undertaking has been so economically laid out and worked that a good return on capital is being obtained after due allowance for depreciation, repairs, and renewals.

The policy of the company in supplying meter and standard gas

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stoves free of charge to the consumers, as well as providing the gas at cheap rates, has been fully justified.

The total capital expended in the gas undertaking to September 30, 1912, was £38,644, and some £6000 has been spent since on the new holder and other works.

The streets of Letchworth are lighted by gas under contract with the parish council.

A general plan of the gas works is shown in Plate IV.

ELECTRICITY

The electrical undertaking was the last of the services to be started, but it has grown perhaps faster than any other with regard to output.

In 1907 Messrs. O'Gorman & Cozens Hardy (now Messrs. Baillie & Dobree), consulting engineers, were employed to advise and submit plans for the new station, the containing buildings being carried out by the company's engineering department.

The power station is a one-story building, well lighted and ventilated. The first instalment of plant consisted of two horizontal suction gas engines, each of 100 horse-power, with dynamos, switchboard, battery, etc. The engines are arranged so that they can be driven by town gas or from producer gas, or both engines can be served from one producer for a considerable period in case of emergency. The engines are started by means of an air compressor, driven by a small gas engine worked by town gas. The dynamos are belt driven from the engines, and the output of each is 65 kw., at a pressure of 500 volts and a speed of 540 revolutions per minute. The machines are of the multipolar type, shunt wound, with commutation pole. The system of supply is three wire, with a pressure of 500 volts between the outers and 250 volts between either outer and the middle wire. The balancers are of the double armature type, capable of dealing with an out-of-balance current of 80 amperes. The battery consists of 260 cells arranged with 130 cells on each side of the system, with a capacity of 600 ampere hours, at a ten-hour rate. The regulating cells are arranged on the neutral or middle wire. The boosters for charging the battery are motor driven, separately

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excited, shunt wound dynamos, with a voltage variation of 10-110 volts. The switchboard is of the non-framed slate panel type, each generator has a separate panel, fitted with an ammeter.

The distribution of current supply to the factories in the factory area, the main shopping streets, and public buildings is carried out by a system of paper insulated lead-sheathed steel armoured cables laid direct in the ground. As pointed out in connection with the gas works, the houses in the residential area are necessarily rather scattered, so that the company cannot yet supply the whole town with electricity at a reasonable rate on a paying basis. One of the main feeders supplies an overhead transmission line running through fields to a 30-horse-power motor at the water works pumping station about a mile distant.

The output had so increased by 1910 that it was decided to install a 200-horse-power Diesel engine direct coupled to a 135-kw. dynamo, at a speed of 195 revolutions per minute. This set has worked very satisfactorily and economically since it was installed. At the end of 1911 the output had again developed so that a much larger unit was needed, and a Diesel engine of 420 horse-power direct coupled to a 280-kw. dynamo, running at 180 revolutions per minute, was added. This necessitated enlarging the station building to double its size.

The last engine installed is placed in the new addition to the building, and there is room for a further increase of plant of about the same capacity.

The output is increasing so rapidly that the safe limit is now being reached, and it will be necessary shortly to provide further plant.

The units generated each year have been as follows :

1908	.	.	.	.	54,836	B.T. Units.
1909	.	.	.	.	109,521	"
1910	.	.	.	.	170,350	"
1911	.	.	.	.	254,889	"
1912	.	.	.	.	460,070	"

As with the gas, it has been the company's aim to supply electricity at competitive rates with other towns, the following being the present rates :

Power.—(a) Three farthings ($\frac{3}{4}d.$) per unit after the first hundred

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hours of maximum demand in any one quarter, the first hundred hours to be charged at threepence (3d.) per unit; or (b) on a flat rate at the following scale :

- 1d. (one penny) per B.T.U. from 10,000 upwards.
- 1½d. (one penny one-eighth) per B.T.U. from 7501 to 10,000.
- 1¼d. (one penny farthing) per B.T.U. from 5001 to 7500.
- 1¾d. (one penny three-eighths) per B.T.U. from 2501 to 5000.
- 1½d. (one penny halfpenny) per B.T.U. up to 2500.

Lighting.—(a) Three-halfpence (1½d.) per unit after the first hundred hours of maximum demand in any one quarter, the first hundred hours to be charged at eightpence (8d.) per unit; or (b) on a flat rate of fivepence (5d.) per unit.

The total capital expended on the electrical undertaking to September 30, 1912, was £20,983.

SEWERAGE

The complete sewerage scheme for the town was designed by the late Mr. G. R. Strachan prior to its development, and this scheme is being carried out.

Practically the whole of the sewage from the town area can be gravitated to the main sewage farm provided in the complete drainage scheme. At present it is being dealt with on a temporary site by broad irrigation only, because when the town was started it was not advisable to outlay large capital expenditure in trunk sewers until it was known how rapidly it would develop. The present farm consists of about thirty acres, and more land could be irrigated if necessary; preparations are being made for laying the trunk sewers to the permanent sewage farm shortly. At present the solids are simply screened off and the liquid irrigated.

The method of treating sewage at Garden City is known as the separate system, the rain water being rigidly excluded from the sewers and only the foul waters dealt with at the disposal works. The advantage of this system is that not only does it materially reduce the costs of construction of the sewers, but the work and expense of purifying at the sewage farm is greatly minimised, the large volume of intermittent and troublesome rain water being omitted.

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The question of combined as against the separate system of sewerage is largely governed by local conditions. There are situations where the outfall effluent does not require to be so pure, such as seaside places where the sewage is either turned direct into the sea or partly pumped. But if irrigation must be adopted, the separate system should be followed.

Owing to the large factory area the probability of taking harmless trade wastes from the factories had to be considered. To allow for this, as well as for the drainage of paved yards and other places which cannot be taken in rain-water drains, the sewers have been designed for a flow of 150 gallons per head per day. Although this large provision has been made, strict control is exercised over what is allowed to go into the sewers. Harmful trade wastes are excluded, any factory creating such being required to correct them on its own premises before they pass to the sewers.

The sewers vary in size from 9 inches to 24 inches for the main outfall.

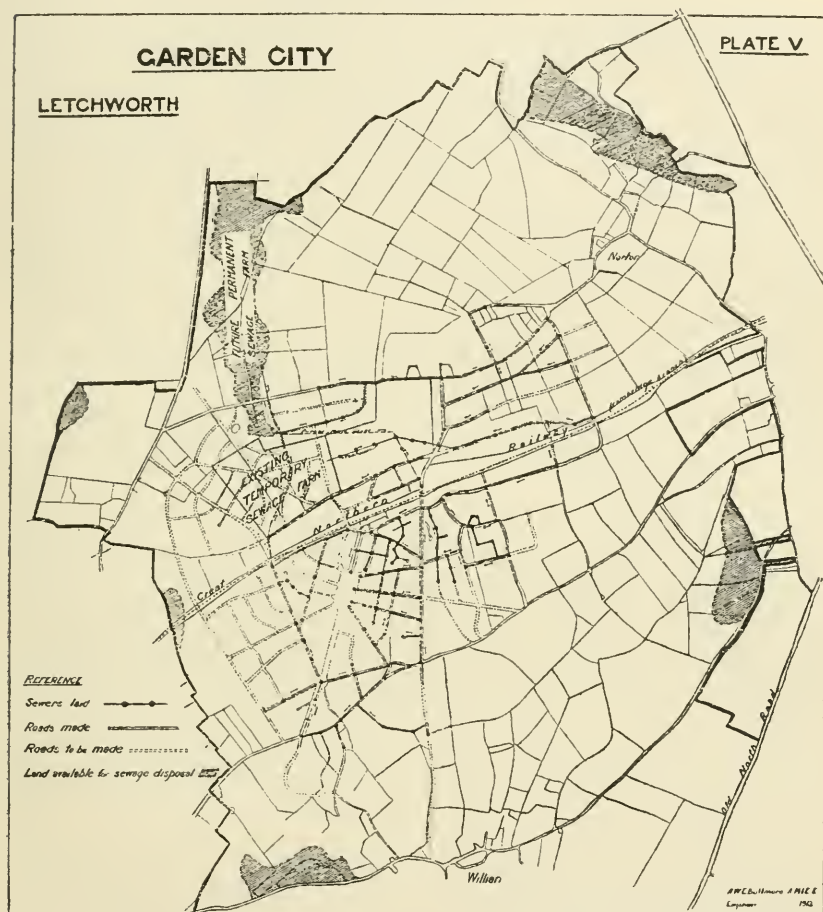
Plate V. shows the lines and directions of the sewers, the present temporary farm site, and the permanent site. The intention is, after laying the main sewers to the permanent disposal site, to deal first with the sewage on broad irrigation lines, and subsequently to introduce bacteria beds, etc., as circumstances require.

The plan of having a temporary sewage farm at an intermediate point, and deferring extension to the permanent site some distance away for a few years, was a financial necessity and the best that could be done under the circumstances.

Economical sewage disposal can only be ensured by carefully contouring the land over the whole area, and judicious planning will exclude low-lying areas for building, using them for other purposes, thereby keeping the sewers at a higher level. This avoids considerable expense in deep cuttings, and the saving in this respect over many miles of a sewerage scheme will more than compensate for a few acres left unbuilt over. Main sewerage lines down the centre of valleys determine the line of the roads; therefore the sewers should, as far as possible, regulate the roads rather than the roads the sewers, even if it be at the expense of the symmetry of the town plan. For the same reason the course of develop-

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ment should be so arranged as to work up the lines of sewerage, and not from the higher levels down ; a long length of main sewer makes no return pending development.



A Sewer Plan of the Estate.

The total cost of sewers to date is about £18,000 (eighteen thousand pounds), and the trunk sewers shown dotted on the plan are estimated to cost £5000.

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ROADS

There is probably no feature of engineering on which there is more difference of opinion than that of road construction, particularly where many different objectives are aimed at, such as artistic appearance, a width that, while making the macadamised roadway and paths sufficient for present needs, will allow the road to be widened hereafter, and planting of trees so as to prevent them overhanging and damping the road or obstructing the lighting.

The mileage of roads made to date is about fourteen. One of the first roads was Norton Way, running from north to south of the town area, and is 60 feet between boundaries, with a 16-foot carriage way of 9-inch slag bottom and 4-inch granite metalling, kerbed with 4-inch pennant kerbing; on either side two 12-foot greenswards and two 10-foot paths; the surface being drained by open ditches in the greensward (Plate VI., No 3). This road has stood well, and being mostly in a good-class residential area the greenswards keep in fairly good condition.

In the shopping area, Leys Avenue (Plate VI., No. 6), the same width was adopted for the roadway boundaries, with 24 feet of carriage way, two 1-inch granite kerbs, two greenswards 16 feet wide, and two 5-foot paths, in addition to which the lessees of shops provide 10 feet of paved pathway in front of their premises, thus making a good wide boulevard. It was found, however, that the grass was trodden under foot, and it became necessary to fence in the unpaved area, leaving cross paths where necessary. This portion has been planted with flowering berberis with good effect. The carriage way was made up of 9-inch slag and 4-inch granite, and is now coated with tarred granite.

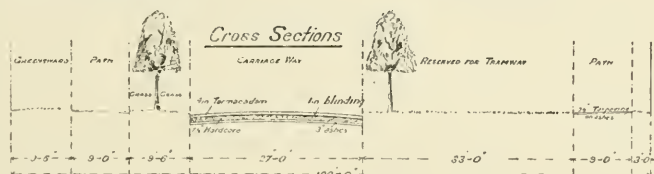
Mountain ash is planted in this road, and when the berries turn the colour effect is pleasing.

With the greensward or planting next to the carriage-way kerbing the appearance of the road is enhanced. It looks wider than when the paths are next to the carriage way. In the working-class areas it was found impossible to keep the greensward in proper order next to the carriage way, owing to children making use of it as a

GARDEN CITY

LEITCHWORTH

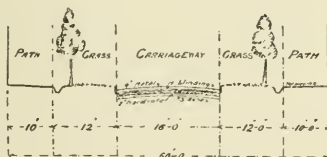
ROADS.



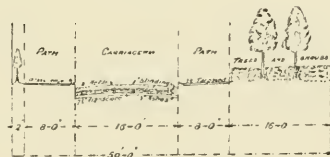
1 BROADWAY S. END.



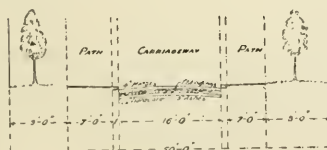
2 BROADWAY N. END



3 NORTON WAY.



4 SOLLERSHOTT E.



5 HILLSHOTT.

AWE Bullmore, AMICE
Engineer 1913.



6 LEYS AVENUE

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playground. This is regrettable, it being desirable that these roads should appear as open as those in the larger house area, but after several trials it had to be abandoned, and the paths put next to the carriage way. Section 5 shows this type of road.

At all corners, whether the greensward or area left for appearance or widening is next to the carriage way or not, a length of 50 feet is planted and fenced with dwarf fencing. This turns the pedestrians on to the paths and prevents them walking on and damaging the grass.

Another type of road which has the advantage of being particularly convenient is section 4. This is a 50-foot over-all width, with 16-foot carriage way and two 8-foot paths next to the carriage way, the remaining space of 16 feet being planted with trees, cross paths being left at the entrance to houses. The benefit of this is that there is no grass to keep, and that the houses on both sides of the road look out on green foliage.

Section 2 is the type of roadway constructed along Broadway from the station to the Town Square. It has a total width of 100 feet, consisting of a 16-foot gravel walk down the centre, two 12-foot greenswards planted with trees and shrubs and bordered with grass on either side; there are two 18-foot carriage ways edged with 12 inch by 6 inch flat granite kerb drained into a 12-inch storm-water drain, and on the extreme edges two 12-foot tar-paved foot-paths. Section 1 is the south end of Broadway from the Town Square to Baldock Road.

The roads at Letchworth have been subjected to rough usage owing to the large amount of carting during building operations; this is inevitable on an estate in course of development. The plate of road sections shows their construction clearly, and a long description is unnecessary.

A. W. E. BULLMORE, A.M.INST.C.E.,
A.M.INST.M.E., M.R.SAN.I.,
Engineer to First Garden City, Ltd.

APPENDIX E

(I.) THE BUILDING OF WORKMEN'S COTTAGES IN GARDEN CITY

A PRINCIPAL object we hoped to accomplish at Letchworth was a marked improvement in housing. How far has this hope been realised, or is being realised, and by what means ?

The housing question is, of course, well understood as being the question of the housing of that largest and most important class of any population, the artisans and labourers, as the demands of other classes have already caused great improvements to be made in the houses provided for them. Its importance can hardly be overstated, for the basis of civilised society is the home, and the house is the basis of the home.

How then are these large classes of the people housed at Letchworth ?

Any picture of Letchworth cottages shows at a glance great differences between it and almost any other industrial town. The cottages are in pleasant streets with the amenities of trees and gardens, and the houses themselves pleasant to look at and varied. They are also in parts of the town at least as pleasant, and with as pleasing views, as the larger houses. All these points are, to say the least, unusual in industrial towns, where the worst sites and the worst soil and long monotonous rows of unpleasing houses are the rule.

Are not these points of importance and value ? What reason have we for thinking that " working men " are so differently constituted from their fellows that, while these things are reckoned of first importance by all " well-to-do " people, they are nothing to artisans and labourers ? It is true that from long habit they do not expect them and have not learned to want them, but there is good evidence that when they get them they value them, and that they increase the pleasure of their lives in exactly the same way as they do those

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of other people. The great architecture of the past was the work of artisans, and their domestic architecture breathed forth the love of beauty ! If there is no such inspiration now, need that be so always ? If surroundings do not make character they at least influence it.

If the tenants had to pay higher rents on account of these amenities it might be a question whether the gain was equal to the loss, though a question the answer to which might very likely be affirmative ; but they have not meant higher rents, as will be seen further on.

All the cottages have gardens. Some are larger than others, to provide both for the enthusiastic gardeners (who are many) and for the few who dislike gardening. But the average size is one-twelfth of an acre, and in the large majority of cases they are well cultivated and filled with flowers and vegetables, often yielding all the vegetables for the need of the family. There are also several playgrounds for young children attached to various groups of cottages and managed by the tenants.

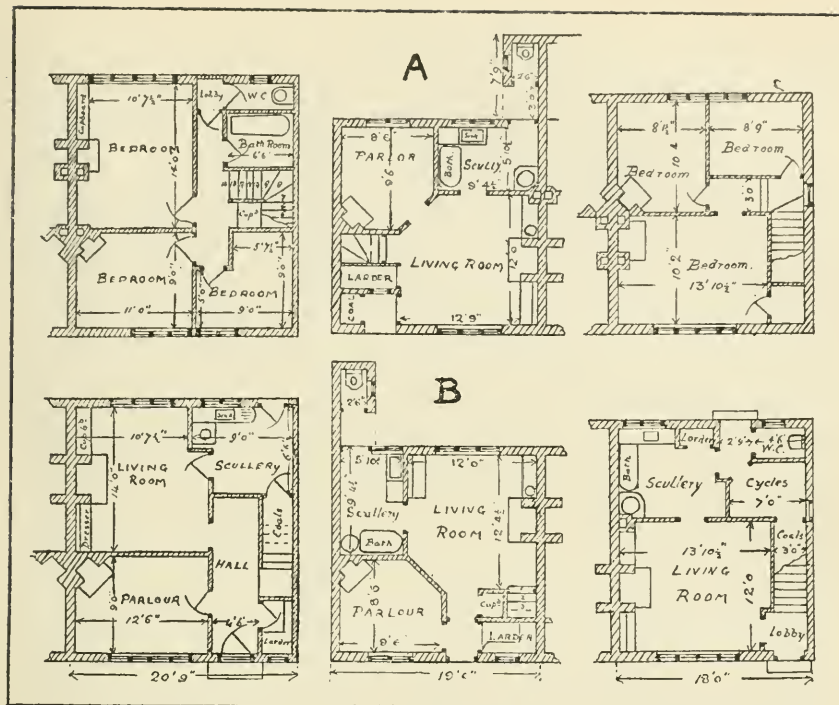
Important as these matters are, it is, of course, true that the inside of the house is more important than the outside. How do the insides compare with those of the houses we are accustomed to see ?

Speaking broadly we may say that nearly all the cottages in Letchworth are planned to admit the maximum of sunlight and to be surrounded with plenty of fresh air, whereas the usual streets of small houses have either the minimum of these or, at least, they are matters the builder has not troubled about. But they are not difficult to secure, and are attainable by a few simple rules of construction such as the following :

The usual deep back projection, shutting out what sun might otherwise reach the back rooms, is entirely absent from Letchworth houses.

The back, instead of being a narrow, dismal, sunless yard, which is all that is visible from the house even when there is a garden behind it, is a pleasant terrace.

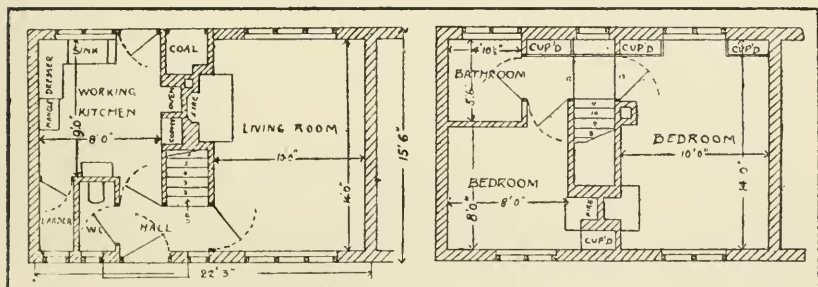
Each street has open spaces between every four or six houses, instead of the houses forming a solid wall or barrack. This contributes to the healthiness of the houses, and is also used to give access to the backs of the cottages.



Type I.
Cottage facing N.

Type II. (A).
Cottage facing S. or E.

Type III. (B).
Cottage facing N. or W.



Type IV. Cottage facing N. or W.

SOME TYPES OF GARDEN CITY WORKMEN'S COTTAGES.

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One house is not so near others as to be in their shade.

We do not build on the same plan whether the house faces north, south, east, or west, but suit the plan to the aspect, so that as far as possible every room shall have sun and the rooms most used shall have most sun. This is not always an easy task, and it is not, therefore, surprising that it is so usually neglected. Indeed, in this respect, our cottages are superior to many houses of many times their cost. The plans reproduced show some typical arrangements.

In regard to what the cottages contain and should contain, the number and size of rooms and their conveniences :

The large majority of cottages are occupied by families, and must, therefore, be such as to make it possible to bring up a family in health and comfort and wholesome family ways, and this includes, as an important factor, sufficient room for reasonable privacy. The standards adopted are : (1) A minimum living-room of at least 144 square feet area, and containing the range and a dresser ; a scullery in which the washing-up and the laundry-work can be done and containing a gas stove, sink, copper, and coal place ; a larder on the least sunny side, with window to the open air ; and a w.c. of good modern pattern, opening usually on a lobby ; and three bedrooms. There is also a full-sized bath in the scullery. For newly-married people or small families a few of the houses have only two bedrooms. (2) Cottages very similar, but with the addition of a very small parlour. (3) Cottages with rather larger rooms including a parlour and with a separate bathroom. All of these and several of the other cottages have also a hot-water supply from a boiler behind the kitchen range. They have also a space for cycles and garden tools, and this is being provided also for many of the smaller cottages.

We do not claim that these, and especially the first, are high standards, but combined with the other amenities of the cottages mentioned above they make comfortable and healthy homes which most of the tenants enjoy and in which they take a proper pride. The large cottages are probably as large as the housewife can comfortably keep in order.

But any lower standards than these would make Letchworth no

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longer a Garden City, and would be in the long run no advantage to the tenants. The small saving that could be made in rents would be much more than offset by the loss either of comfort or of health and of good family life. Take, for instance, the advantage of the scullery work being done in a room separate from the living-room. It may add 6*d.* to the rent, but is it not worth much more than 6*d.* ? The hot-water supply costs about 2*d.* or 3*d.* a week. How small a price for so great an advantage. The bath costs hardly anything, and though it is, no doubt, not always much used, the habit of bathing cannot be created if the means do not exist. We must remember that it is a modern habit in England even among the well-to-do, and that we are still far below some other nations, both modern and ancient, in the matter. When hot water is supplied to the baths undoubtedly they are much more used.

These, and many other points of detail, are questions of experience. In regard to each it has to be considered, not only whether they are desirable and desired, but how much they are desired—whether they are, in the opinion of the tenant, worth what they add to the rent. Many inquiries are continually made with this object, and the results are considered in planning the cottages. Of course no one standard could possibly suit all needs.

It is, of course, obvious that such cottages as these, even the smallest of them, are immensely better as potential homes for the young generation than the two or three rooms in a block-dwelling which house so many thousands of families in our large towns. They are not, however, larger, though they are better, than houses that can be had in the suburbs of towns and at about the same rents ; but living in a suburb involves a waste of two and sometimes three hours' travelling daily, and the houses are usually inferior in healthiness and in all the amenities referred to above, and generally also in convenience of arrangement tending to reduce house work.

It seems, therefore, quite certain that, as far as housing conditions are concerned, work-people at Letchworth are very distinctly better off than in other industrial towns, and if it were not so we should indeed have lamentably failed.

It is also almost equally obvious, and is recognised by the best employers, that under these conditions the workmen themselves

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are better men. They come to work not after a night in the fetid air of a crowded street, and not after an hour's journey as strap-hangers in a crowded train. They have a fuller and better family life, and better health for themselves and their wives and, of course, for their children, and sickness in the man or his family is always a large deduction from his efficiency. His children are also growing up under conditions which will make them better men than he, and these will not only be the men and women who will in a few years form the nation, but will be the workmen of the immediate future on whom the prosperity of industry will depend.

As to the cost and rent of cottages. A good many have been built by private persons, and 320 have been built by the Garden City Tenants: the exact figures of these are not available. But over 400 have been built by cottage building societies of which the cost and rents are exactly known, and they probably do not greatly differ from the others. The average cost is between £150 and £200.

These cottage societies were formed because of the urgent need of more good cottages at moderate rents and not to make profit beyond the low rate of interest due to a reasonably secure investment, as is proved by the fact that they laid down as a fundamental rule the maximum dividend or interest which should ever be paid however prosperous the society might be. The cottages they have built yield a dividend which is well secured. The dividend or interest varies from 4 per cent. to 5 per cent., and averages about $4\frac{1}{2}$ per cent. Companies or societies formed on this basis can borrow from half to two-thirds of the cost of the cottages from a government department at $3\frac{1}{2}$ per cent., so that the average interest which needs to be paid on the whole cost of the cottages is only about 4 per cent.

In addition to this the rent includes repairs, collection and management, insurance, sinking fund to repay capital in 99 years, and empties, and on an average these items amount to about 3 per cent. on the cost. The rent also includes ground rent, which amounts to about 7*d.* to 10*d.* per cottage, rates which amount according to value of cottage to about 6*d.* to 1*s.*, and cost of water supply which amounts to about $1\frac{1}{2}$ *d.* to $3\frac{1}{2}$ *d.*

Taking all these items into account, the rent (including rates and

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water) of a cottage costing about £150 has to be about 5s. 6d.; £170, 6s. to 6s. 6d.; £200, 7s. to 8s. A few are as little as 4s. 6d. and a few as high as 9s. 3d.

If the tenants pay rent (as they do) on that basis, they pay in rent the full value of their houses, and building cottages is not a charitable undertaking involving any loss or expense to subscribers, but merely means the use of capital in a financially sound way, as well as for a most useful purpose. That it is sound is proved by the result of four years' experience. Although the rents are fixed on this basis and are not rack rents, the full dividend to which the subscribers are limited has been regularly earned and paid by the Letchworth Cottages and Buildings, Ltd., and by the Howard Cottage Society, Ltd., its successor. A third society, the Letchworth Housing Society, Ltd., has not yet published its results. Reserve funds of moderate amounts have also been built up, somewhat larger than there is probably need for, so that the rents in the future are more likely to be reduced than to be increased. As the dividends and interest payable cannot be exceeded, rents will, at all events, not be raised on account of the growth of the town, as of course usually happens with private property.

Many more cottages are needed, and many will be needed each year for some years to come. To investors who do care about the use of their capital, cottage building under the circumstances obtaining at Garden City offers an opportunity of a reasonable and sound investment which is at the same time a philanthropic work in the old sense of the word if not in its modern, somewhat degraded, sense. This is no doubt the wisest kind of philanthropy.

It will be seen from what has been said that the rents are not increased by any of the amenities referred to in the first part of this article, except by the one item of the larger space of ground given to each cottage, and the extra cost of this is only some fraction of the 7d. to 10d. allowed for ground rent. For this small outlay the tenant gets, besides a large garden of his own, the great advantage of being surrounded with other gardens and entire absence of over-crowding, with all its evils.

The pleasantness of the houses is not due to "ornament," but to good design and good site planning. This makes an actual

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economy in the building, for the "ornament" added to the ordinary villa costs something though it is worth nothing or less than nothing.

In Letchworth the rule is to roof all houses with tiles, and in the opinion of some people this is an extravagance, as it is said to be more costly than slate. If this is so the difference is a very slight one, and is offset by the fact that a tile roof is warmer in winter and cooler in summer. And it should also not be forgotten that the common lead-coloured slate used in most of our towns is one of the items, though not the most serious, which makes their appearance so ugly and depressing, to avoid which is of real importance to the lives of the inhabitants.

Every effort is made to build with the utmost economy compatible

(II.) THE COTTAGE COMPANIES

Name of Company or Society.	Amount of Subscribed Capital.		Amount of Loans.	Capital expended on Property.
	Shares.	Loan Stock.		
Garden City Tenants, Ltd. (A society registered January 23, 1905, under the Industrial and Provident Societies Act, 1893.)	£20,588	£29,759	£48,299	£98,330
Letchworth Cottages and Buildings, Ltd. (A company incorporated April 3, 1907, under the Companies Acts, 1862 to 1900.)	25,500 guaranteed 4% preference shares of £1 each. 4500 ordinary shares of £1 each	—	£11,830	£35,033
Howard Cottage Society, Ltd. (A society registered August 11, 1911, under the Industrial and Provident Societies Act, 1893.)	490 shares of £5 each, dividend limited to 5%	£5225 bearing interest at 4½%	£44,044	£49,180
Letchworth Housing Society, Ltd. (A society registered Oct. 19, 1911, under the Industrial Provident Societies Act, 1893.)	866 shares of £1 each, dividend limited to 5%	£3145 bearing interest at 4½%	£2703	£6852

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with good work and the best rates of wages in the district, and the interesting and valuable fact has been established that it costs no more to build cottages of these types than to build the ordinary bad type. There is no real economy in the vicious method of deep projecting backs, except in the one matter of ground rents, and hence it is abundantly proved at Garden City that the principle of building on virgin soil where a reasonable curtilage costs even less than a small cramped area of highly-rented land is the real secret of good housing at moderate rents.

H. D. PEARSALL, M.Inst.C.E.,
Chairman, Howard Cottage Society, Ltd.

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Number of Cottages built or building.	Basis on which Rents are fixed.	Lowest and highest weekly Rents.	Dividends paid on Shares.	Particulars of Sinking Fund.
326 houses, Institute, and 2 shops	(Not given)	4/6 to 16/6 exclusive of rates	2½%	10s.% on completed property with compound interest at 3½%
197 cottages, 1 factory	7% on capital cost plus ground rent and rates	4/3 to 6/9 inclusive of all rates	4% on preference, 5% on ordinary	3s. 9d.% on capital cost with compound interest at 4%
268	To show a net return of 4%	5/6 to 9/3, inclusive of all rates	5%	10s.% on capital expended with compound interest at 3½%
58	To show a net return of 5%	5/6 to 6/3, inclusive of all rates	(Hardly yet in operation)	None at present

NOTE.—In addition to these companies the Hitchin Rural District Council, the First Garden City, Ltd., Messrs. J. M. Dent & Sons, Ltd., and many private persons in the town have built workmen's cottages.

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(III.) A SIMPLE HOT-WATER SYSTEM FOR COTTAGES

Various economies and improvements on old methods of building brought into use by the exercise of some originality have helped to reduce the cost as well as the maintenance charges of cottage property at Garden City.

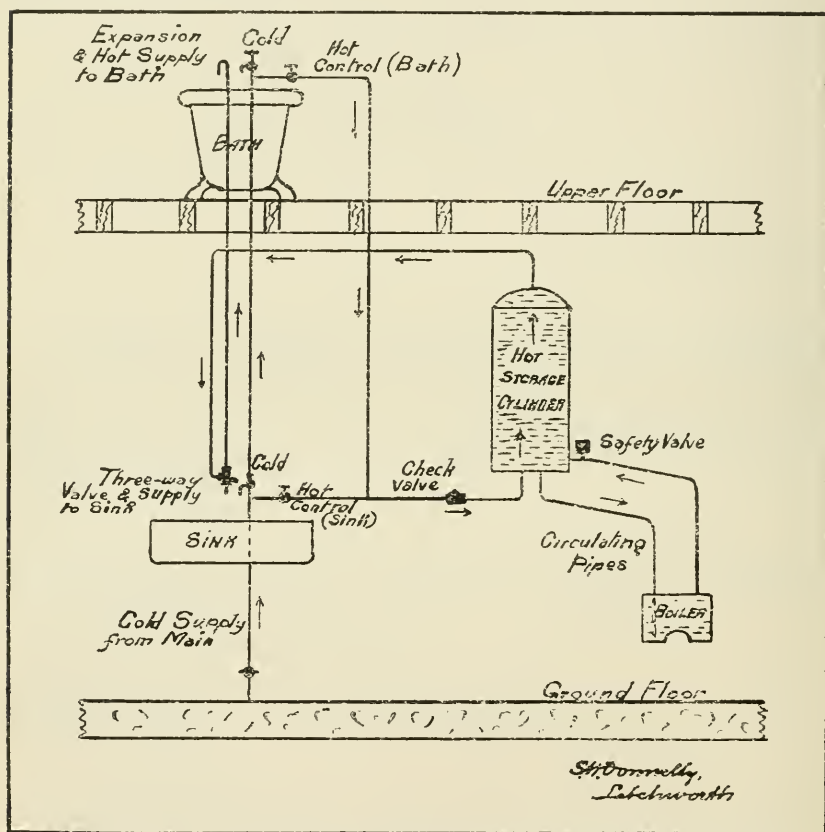


Diagram showing a simple Hot-Water System for Workmen's Cottages in use at Garden City.

Two instances of this may be mentioned : (I) the " rodding eye " system of drainage, referred to under the heading of Building

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Regulations ; (2) a simple system of water supply specially designed for cottages, introduced by Mr. S. H. Donnelly, A.M.I.M.E., Chief Assistant Engineer to the Garden City Company.

This hot-water system is an improvement on a very old method of supplying the kitchen boiler direct from the main supply. By this improved system ample storage is provided by a cylinder which cannot draw empty with ordinary use, and a special three-way valve allows of the bath being fixed either on the ground or first floor. No cold-water cistern is needed with the usual pipes, ball valve, etc., so that the possibility of frost-bursts in the winter is remote.

The system is explained in the accompanying diagram.

The cost of installation on these lines is about 25 per cent. below that of the ordinary " tank " system, and the upkeep is correspondingly less. The system is installed in about two hundred cottages at Garden City and has given excellent results.

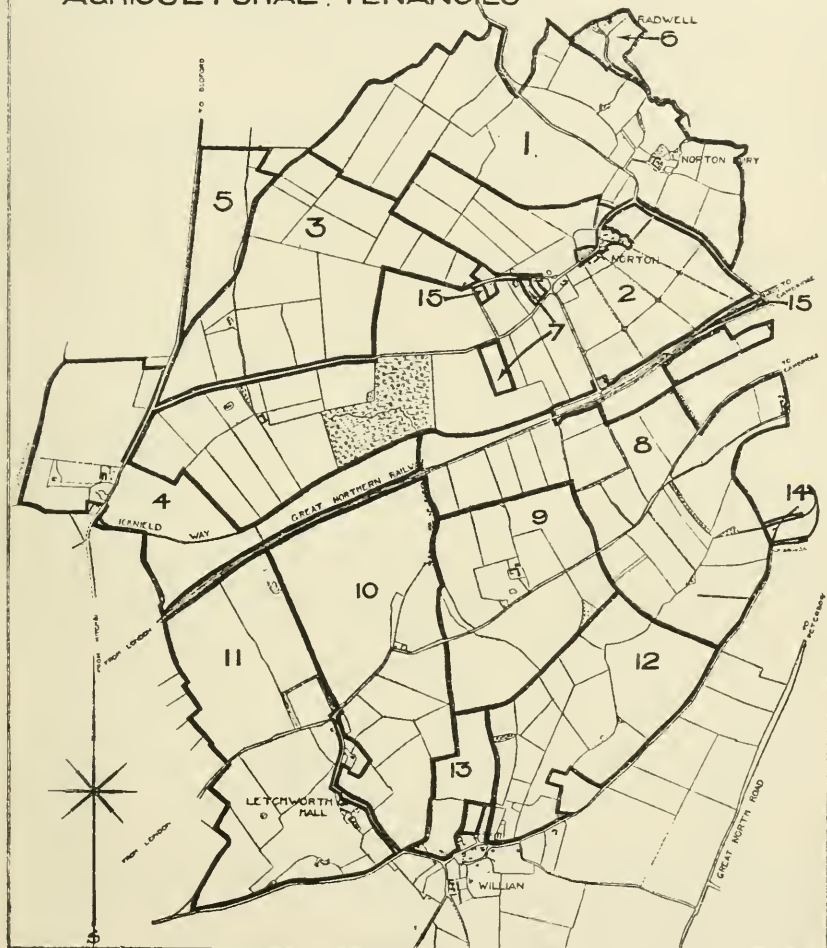
APPENDIX F

AGRICULTURE AND SMALL-HOLDINGS IN GARDEN CITY

THE improvement of agriculture was not the primary object of the founders of Letchworth as a Garden City ; but, as such a town must have, as an essential part of the scheme, a large area, perhaps three times that of the town itself, of agricultural land, agriculture must be considered in connection with it, and becomes indeed only next in importance to the development for, and erection of, factories, shops, and dwellings.

The condition of agricultural Letchworth in April 1904, at the time of my first visit to the estate, and before the first brick of the town had been laid, showed many signs of the hard times through which agriculturists had passed. With the exception of Letchworth Park, some pasture by the River Ivel, and a few paddocks and closes about the various homesteads, the estate was arable and comprised 3818 acres. It had been purchased in 1903 from fifteen owners, and was in the hands of a less number of occupiers (excluding allotment holders), the largest occupation consisting of 841 acres. The population was about 400. Farm-houses and buildings were dilapidated, two farm-houses being uninhabitable. The greater part of the land, though not all, was in a neglected condition. Steam cultivation for corn growing, being cheaper than horse labour, was practised over the large area from Norton Way on the east to Spring Road on the west. Needless to say, little labour was employed, the landowners whose rents averaged from 8s. 6d. to 25s. per acre had let large areas at these low rents, no doubt the best obtainable, and they themselves were absentees. It is easy to condemn such a seemingly negligent policy, but there would seem to have been no other course open at that time unless considerable capital expenditure had been made.

FIRST GARDEN CITY PLAN SHEWING AGRICULTURAL TENANCIES



A Plan showing the Original Agricultural Tenancies (1903).

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The following table gives the occupation, area, and rent of the holdings at the time of purchase :

Farm.	Area.			Rent.	Remarks.
	a.	r.	p.	per acre.	
1	462	2	4	12/6	No homestead. Residential.
2	841	3	31	16/-	
3	278	1	8	17/-	
4	293	0	18	8/6	
5	79	2	5	25/-	
6	27	0	28	—	
7	14	1	2	—	
8	484	1	4	22/-	
9	252	1	3	16/-	No homestead. Odd pieces.
10	370	3	14	13/6	
11	387	3	18	25/-	
12	264	3	3	16/-	
13	55	3	33	16/-	
14	2	0	10	19/6	
15	5	0	26	40/-	

One of the greatest difficulties the company had to meet was the necessity for taking in the first few years of its development several hundred acres for building. This involved arrangements not only with the tenants, but also with the mortgagees, who, sceptical of the success of the scheme, were reluctant to see the tenants displaced. However, satisfactory arrangements were made in every case but one. In this instance damages were claimed by the tenant in his outgoing valuation against the company for alleged trespass by visitors whom they had attracted to the estate, and a well-known solicitor put forward the argument on behalf of the tenant that though an occupier had no claim against his neighbour for damages caused to crops by rabbits in the ordinary way, yet if that neighbour brought down train loads of rabbits and emptied them on to his land the case was different and damages could be obtained. Whether or no this argument was good, much can be made in farm valuations of such damage, and it will be recognised how necessary it was for the company to have sole control of a large area.

About 1000 acres comprising about five-sixths of the entire area of the new town have, up to the present date, been taken in hand

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or let on short tenancies, part of which is developed, the remainder being readily available for development as required. Part of this area is farmed by the company and a small profit made. The treatment has been to lay down this development area in pasture, which saves both damage by surveyors and others and expense in working. It also facilitates development operations. It has, however, involved clearing the original tenants from practically all the land comprised within the town area. The rest of the estate, including the whole of what is to be preserved as the agricultural "belt," remains in agricultural occupation; though the original holdings, with one or two exceptions, have been broken up.

At least one shareholder claims that the company was committed to follow a definite policy in the creation of small-holdings, which was thought to be one of the leading ideas of the Garden City promoters. But although the making of small-holdings has always been a matter to which the company has given much attention, it has to be remembered, in this connection, that no capital was available for the equipment of small occupations with cottage and buildings. The company is not a building company and has not had capital available for that purpose; its work and capital have been necessarily directed to the development of agricultural land into building sites ready for the person who requires to build, be it for residences, cottages for investment, or a factory.

The offer to would-be small-holders had, therefore, to be as follows:

You must build a cottage for yourself, for which purpose we offer you a quarter-of-an-acre site, or more, with road frontage and water main, on a building lease of 99 years at a fixed ground rent. Adjacent to this site we will let you what area of agricultural land you require on an agricultural lease of 21 years.

That was the policy adopted, and the small-holdings so created must be considered apart from the company's general agricultural policy.

Some 300 acres have been taken up in this way, the land being situate on the east of Green Lane, and the south of Baldock Road from Jackman's plantation on the east to the old Willian parish boundary on the west, the latter area being in a most favourable position.

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This system of letting may be at fault and may not appeal to the right man, but the fact remains that the area occupied by these holdings is (with certain exceptions) the least successful over the whole estate. In the majority of instances these holdings have been taken by townsmen with but a poor knowledge of the business. But it may be said in their favour they were pioneers, and though we have a population of 8000 people to feed to-day, this number has not always been present to consume market-garden produce. The lot of the small-holder is a hard one, and though the toughest and shrewdest make good headway, it is a bad policy to foster this development under any but the best conditions as to soil, position, etc. Just to live and no more, on a 10 to 15 acre holding, working from daylight until dark, day after day, and bringing up a family to repeat the same thing after, is not a desirable lot.

A society formed of influential men keenly interested in the development of small occupations applied for, and were let, in 1905, 150 acres on a 21 years' lease at Norton, to be managed and let out by them. Ten cottages were built and the land divided up into small areas up to 20 acres, but in spite of the enthusiasm of the management the land is gradually getting back into large occupations.

The fact is that farms can be worked in approximate areas of 100 to 300 acres with the greatest advantage as to organisation of labour, rotation of crops, live stock reared and fed, ability to withstand bad seasons (such as the drought of 1893 or the incessant rains and floods of 1912), and the employment of the most modern machinery. On such farms, *especially where the labourers are housed under the best conditions*, with well planned and suitable cottages and large gardens, both farming and market gardening are seen at their best. Allotments and small-holdings should always be available in sufficient quantity for stockmen and labourers employed on such farms to enable them to fight their way up by first taking a few acres and gradually improving their position. Small-holdings need be present in no greater quantity than is necessary for the stout-hearted to use as stepping-stones to a better position in the same business.

It can thus be seen that a policy of artificially creating small-

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holdings on the Garden City Estate seven or eight years ago would have been disastrous to its object.

Insistence on the difficulties of carrying through a certain object is apt to give an impression that the writer holds pessimistic views as to its successful accomplishment. I should be sorry to have my views on this question of small occupations interpreted in this way, as I know, as well as any one, that there is no want of the right men for this work. But money is not made easily or rapidly in any branch of agriculture, perhaps least of all in this particular branch ; and I wish to make it clear that owing to these difficulties it is unfair to the poor and hard-working holders to transplant them under circumstances where failure is foreshadowed. It is far better, where the transplanting has to be done, to commence on a small scale, and not let these men risk losing, in one or two seasons, capital saved through years of industry and thrift.

A certain degree of success is the best stimulant for this movement, and to attain this great care in breaking up new ground is necessary.

With every desire to encourage the small-holder, the Garden City Company had to be cautious in its dealings with those who applied to it for land. "Back to the land" enthusiasts were attracted to the estate in large numbers, believing that they could do there, under what promised to be favourable conditions, what they certainly could not do elsewhere. Those of them with obviously inadequate capital had to be discouraged, and many others could not get what they wanted and met with disappointment. The fact is, that without sufficient capital and previous training, men are as unlikely to succeed in the business of small-holding cultivation as in any other.

Had the financial resources of the company enabled it to equip a number of holdings (it did in fact equip one) much more might have been done. But the company, like many other landlords, has never had money available for such a purpose. In this respect, and in others, government assistance is very urgently required. Not only small-holdings but agricultural development in general stands in need of cheap money, which only the state can supply. For the equipment of holdings, for labourers' cottages, for education,

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and for organisation purposes money is required. A large amount of money is already spent on agricultural education, but it is doubtful as to how much reaches those who are in need of it, or how much is spent in educating men who never follow the industry.

Of the three bodies concerned in agriculture, the government, the landlord, and the occupier, the former have inadequate representation from agriculturists, and are not sufficiently interested to take the initiative in many matters urgently needing reform, and do not lend assistance where it would have the greatest effect. They must accept the greater responsibility for the majority of the defects to be found in the system of farming practised in this country and the non-application of the proper remedies.

The landlord and the occupier have defects to remedy, but by far the majority of such defects they are powerless to alter without the aid of government.

Teaching in this industry is often attempted by persons who are inferior in practical knowledge to the men they would teach.

Most people who have studied the subject will admit that the system of marketing (*i.e.* disposal of produce) in this country is bad. It is very rare that the producer and consumer are in direct touch. The middle man, who more often than not is an expert at dealing, while the farmer—speaking generally—is not, often gets more profit out of a crop in a few days than the grower can during the whole time of production. It seems difficult, if not impossible, for farmers to remedy this defect unless assisted by the state.

Though only one holding of 25 acres has been equipped by the company they have never hesitated to improve the existing home-steads, and about £5000 has been up to the present spent in this way. In addition to that expenditure many acres have been drained and cleaned each year; several miles of hedges have been laid; and many occupation roads and farm-yards have been made up. There are now 74 occupiers (counting 150 acres let to a society as one) as against 15 occupiers in 1904, and an agricultural rental of about £3835 as against £3935 in 1904, though about 1000 acres less are used for agriculture.

The following table gives the areas and occupations in the present year, 1913:

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Holding.	Acreage.			Rent.	Remarks.
	a.	r.	p.	per acre.	
1	460	1	8	12/6	
2	106	2	38	25/9	
3	148	0	17	25/-	
4	58	1	16	27/8	
5		2	2	50/-	
6		1	0	30/-	
7		1	0 0	40/-	
8		2	16 0	53/4	
9		2	0 0	35/-	
10		1	0 20	40/-	
11			1 34	40/-	
12		2	0 0	40/-	
13		5	0 0	40/-	
14		2	0 30	30/-	
15			2 0	40/-	
16			1 0	40/-	
17		2	1 0	40/-	
18		3	0 0	40/-	
19		5	0 0	40/-	
20		2	0 0	40/-	
21		1	1 10	40/-	
22		46	0 0	30/-	
23		1	3 4	40/-	
24			1 0	40/-	
25			30	40/-	
26		41	0 9	30/-	
27		171	2 35	27/6	
28		81	3 9	27/8	
29		1	0 0	40/-	
30		4	0 16	40/-	
31		1	0 0	40/-	
32		1	0 0	40/-	
33		44	2 0	20/-	
34		7	0 16	24/9	
35		127	2 14	27/4	
36		10	0 0	30/-	
37		257	1 22	29/9	
38		25	1 0	40/-	
39		24	0 0	24/6	
40		38	1 4	20/4	
41		2	0 8	40/-	
42		1	2 33	40/9	
43		2	0 33	32/6	
44		4	0 25	25/1	
45		23	3 23	33/-	
46		5	0 0	40/-	
47		1	0 12	40/-	
48		7	2 17	31/6	
49			1 14	40/-	
50		1	0 3	40/-	
51			1 14	40/-	
52		7	0 30	32/2	

The Garden City

Holding.	Acreage.	Rent.	Remarks.
	a. r. p.	per acre.	
53	3 2 32	40/-	
54	1 20	40/-	
55	3 2 30	40/-	
56	2 0	40/-	
57	2 16	26/8	
58	28 0 12	30/8	
59	76 2 36	20/-	
60	2 2 0	48/-	
61	2 0 0	60/-	
62	1 0 0	26/6	
63	187 2 26	26/7	
64	1 0 0	40/-	
65	1 0	40/-	
66	90 0 11	22/2	
67	25 0 0	68/2	
68	46 1 25	28/7	
69	10 0 0	40/-	
70	27 0 28	—	Residential.
71	79 3 19	26/8	
72	260 3 35	20/4	
73	5 0 20	78/4	
74	2 0 10	19/6	
75	12 1 23	40/-	Let in allotments.

It is difficult to give the amount of labour expended now with what it was in 1904, but there has been a large increase.

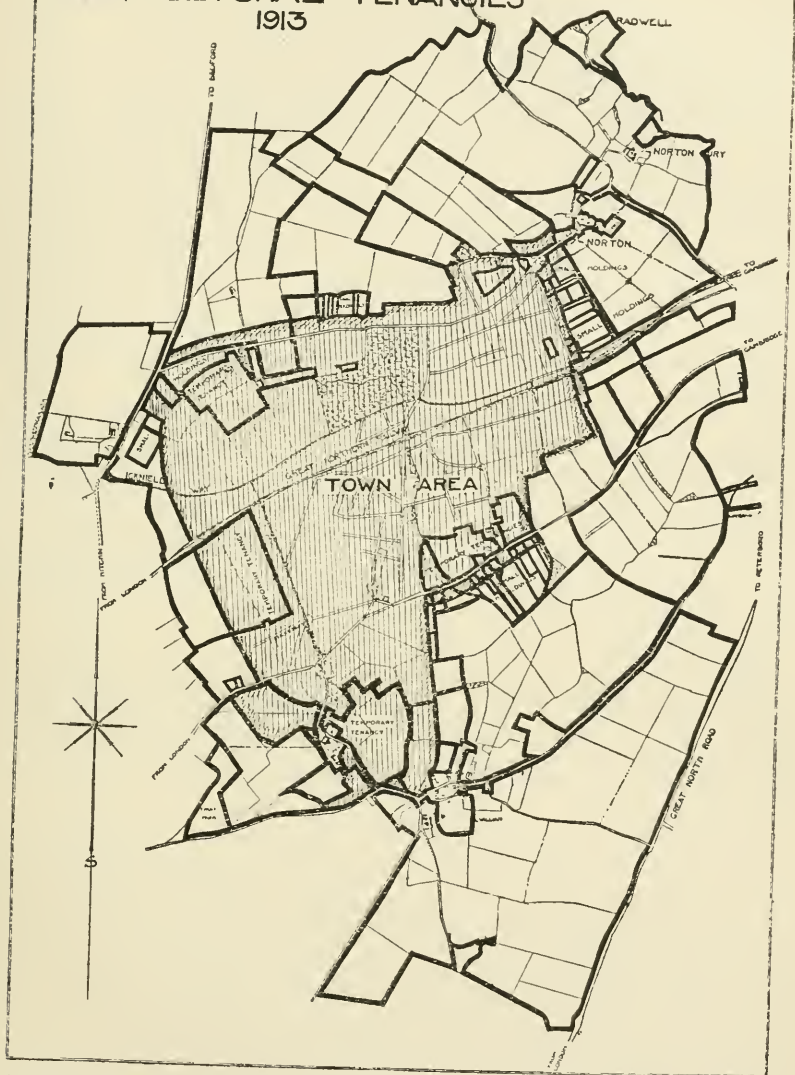
As about 350 gallons of milk are now sold daily in Letchworth, many of the farm buildings have been remodelled to accommodate the cows on hygienic lines. This branch of agriculture is increasing as the population increases, and is the most successful branch of farming carried on. As the estate contained very little permanent pasture, nearly 300 acres have been put down, thus improving the farms for the above business.

The source of the town's water supply has been surrounded with pasture in place of arable fields, so as to obviate any necessity for importing manure on to this ground.

There are some three or four instances of successful flower and tomato culture under glass, also in a few instances market gardening in areas of 25 acres is profitably carried on in conjunction with other trades.

There are some 30 or 40 acres planted with fruit, but the time is too short to judge of the success of this.

FIRST GARDEN CITY
PLAN SHEWING
AGRICULTURAL TENANCIES
1913



A Plan showing the Agricultural Tenancies (1913). The large area in the centre (about 1200 acres) comprising the town area has now been developed or is in the hands of the company.

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Twelve acres are now let in allotments as against 5 acres in 1904, and though the condition of the land at the commencement of taking up retards heavy cropping, the acreage is steadily growing, and no genuine applicant is ever refused.

It has been suggested that one improvement which might be made on this estate is that of encouraging breeding from a healthy milking strain, good both in quantity and quality; but even though the company were to foster such an improvement by purchasing bulls of the right kind, the town might not reap any advantage, as probably by far the greater number of cow calves so bred might be sold away. This points out clearly that isolated efforts cannot be attended with the best results. Such improvements, if made under the direction of the Board of Agriculture throughout each county, would be more successful.

In the case of the milk supply the Garden City does indeed provide an opportunity for an experiment in co-operation among producers. Never was there, I think, a better opportunity than this town offers for a central dairy which would collect and distribute the milk produced on its own dairy farms. Such a scheme could be put under capable and practical management, and the producers should have a legitimate share in any profits made, and a voice in the management.

I have attempted in the foregoing to show what progress the company has made with its agricultural belt during the period of ten years, and if the length of time it takes to effect agricultural improvements is considered, I think the progress will be considered to be satisfactory.

As to the future it is, of course, far more difficult to speak, but it may certainly be said that the hardest time for the agriculturist in Garden City has passed. The important questions of the future are the cheap and proper housing of the farm workers, and the up-to-date equipment of workable-sized holdings of from 50 to 200 acres. A combination of those who are producing milk for the town so as to ensure the supply of the best quality to the consumer and the best return to themselves would probably be followed by other co-operative efforts which would embrace the supply of vegetables direct from the grower to the consumer.

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All the above questions are receiving much attention, and it is expected as time goes on that they will be settled. The thing that must not be overlooked is that the agricultural belt surrounding Garden City might be made the scene of a considerable agricultural advance. But in agriculture it is not impetuosity which is required.

H. BURR, F.S.I.,
Surveyor to First Garden City, Ltd.

APPENDIX G

THE GARDEN CITY IN RELATION TO LOCAL AUTHORITIES

FIRST GARDEN CITY, LTD., stands in an unusual position with regard to the local authorities. When the estate was purchased it was situated mainly in three parishes, Norton, Letchworth, and Willian, with a parish meeting to each parish. The estate, however, being planned out as a whole, without reference to its parochial position, it appeared to the company desirable that the three parishes should be merged into one, and in the year 1907 an application was made to the county council under the Local Government Act of 1888 to alter the parochial boundaries and constitute a new parish, comprising practically the whole of Garden City area. After an inquiry the Local Government Board issued an order,¹ which took effect from April 1, 1908, whereby the area of First Garden City, Ltd., in the county of Hertford, was constituted in a new civil parish with a parish council of fifteen members, the part of Willian parish comprising chiefly land not belonging to First Garden City, Ltd., being left as a parish by itself. The portions of the Garden City Estate in the county of Bedford and in the parish of Radwell were not interfered with, and the estate of the company therefore up to recently was comprised in the new parish of Letchworth and the parishes of Radwell and Great Wymondley in Hertfordshire, and Stotfold in Bedfordshire. Since the recent purchase by the company of the 748 acres of the Roxley Estate the company possesses additional land in the parish of Willian, which has a parish meeting only; Radwell possesses a parish meeting and Stotfold a parish council. The parishes of Letchworth, Radwell, and Willian are comprised within the rural district of Hitchin, and Stotfold within the rural district of Biggleswade,

¹ Local Government Board Order No. 51,691.

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the rural district of Hitchin being within the area of the Hertfordshire County Council and the rural district of Biggleswade being within the area of the Bedfordshire County Council. With the exception of the land held by the Great Northern Railway, of the school sites purchased by the Hertfordshire County Council, of the sites of the rectory and some glebe land at Letchworth, the vicarage of Norton, four cottages and a blacksmith's shop, and the land sold to certain churches, all the land within the parish of Letchworth is owned by First Garden City, Ltd. With the exception, also, of the three original main roads vested in the county council and of the roads such as Letchworth Lane and Icknield Way vested in the rural district council, all the roads on the estate were laid out and formed by First Garden City, Ltd., at its own expense. Some of these roads, such as Norton Way, Station Road, Leys Avenue, Broadwater Avenue, Broadway, Hillshott, Broughton Hill, and Pixmore Avenue, were in the year 1911 taken over by the Hertfordshire County Council. The rest of the roads still remain vested in the company, their upkeep and maintenance being provided for by it, but paid for by the lessees or tenants whose land abuts on the roads, under the covenants of the leases granted by the company. The sewers and drains under the main roads, which are usually provided by the sanitary authority—in this case the rural district council—have been provided by the company. The cleansing and maintenance of these sewers and the cost of sewage disposal are paid for by the tenants under similar covenants in the leases to those applying to the maintenance of the roads. The lighting of the estate, until recently, was provided by the company, and is still undertaken by it, the cost being borne by the parish council. The water supply is provided by the company and paid for on a scale of charges based on the rateable value of the premises served, or in the case of supplies other than for domestic purposes by meter. The gas supplies are provided by the company under its scale of charges, and electricity is supplied in like manner. Neither the water, gas, nor electricity works are under statutory enactments, but belong to the company as part of its ordinary undertaking.

It will thus be seen that the company owns practically all the

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land within the parish of Letchworth, that it performs much of the work usually carried out by a local authority, and that it provides the supplies of water, gas, and electricity usually provided by a local authority or statutory companies. This has been deliberately done. The forming of the Letchworth Garden City was a new venture. Its aim was to create a model estate on a virgin area, untrammelled by pre-existing conditions, and to do this it required to have all the agencies governing the proposed scheme in one hand. Experience has shown that the aims of the promoters have been justified. The company has been able to plan the estate just as it thought fit, to place its roads where it thought best, to arrange from the start a sewerage system, water, gas, and electric supplies, the situations of the factory, cottage, and residential areas, the position of the parks, open spaces, recreation grounds, and golf links, the schools, churches, and public buildings, and all this untrammelled by conflicting claims of local authorities, statutory companies, or the interests of local owners. An enormous amount of friction, correspondence, and communication has thus been avoided. It may safely be said that without this centralisation the scheme would have been sadly hampered and complicated. Great praise is due to the local authorities, county, rural district, and parochial, in having trusted the company to do its work to the best of its ability in the interest of the community and in not hampering or interfering with it. They have shown a restraint from petty tyrannies which might seriously have hindered the company in carrying out the scheme in its entirety.

In the fullness of time the powers and dignity of the local authority will doubtless be increased, more roads will be taken over, the sewers, drains, and sewage disposal works transferred to them, and the maintenance charges now paid for by the lessees under covenants in the leases will be transferred to the rates, and the full benefits of the entire undertaking, including the water, gas, and electricity supplies, will be held in trust for the community, after due provision has been made for the paying out of the shareholders and the liquidation of the company's liabilities. This, however, can only take place when the scheme has been substantially carried through. The company, which has initiated the scheme, created

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the machinery for its construction and maintenance, must continue its control until it has finished its work.

In no niggardly spirit has the company performed its duties, and though the claims of the shareholders and creditors of the company must be fully safeguarded, as they have provided the money by which this noble enterprise has been rendered possible, the company has shown that its first aim has been the good of the community, and it has often rejected considerations that would have aided the material advantage of the company to the detriment of its ideals. What the company needs from the local authority is cordial co-operation, and possibly, at times, friendly criticism. When the final chapter in the history of the scheme has been written, may it be seen that Letchworth Garden City has been brought to a successful issue by the public-spirited action of the company, its shareholders, directors, and servants, and by the far-seeing views and co-operation of the local authorities.

It may be interesting to state a few figures showing the progressive position of Letchworth in relation to the rural district of Hitchin.

The following are the net assessable values of Letchworth parish as compared with the total assessable values of the whole union :

Year.	Letchworth.	Norton.	Willian.	Hitchin Union.
	£	£	£	£
1903	1,051	1,069	2,076	158,095
1904	1,282	1,626	2,578	178,324
1905	1,282	1,626	2,578	178,324
1906	3,181	2,075	2,998	185,807
1907	4,917	3,371	3,686	185,737
1908	7,792	5,034 ¹	6,459 ¹	194,854
1909	19,280	—	—	198,219
1910	24,821	—	—	207,463
1911	28,957	—	—	213,797
1912	33,245	—	—	223,176
1913	37,546	—	—	229,988

At the time of the purchase of the estate by the company the representation on the rural district council and board of guardians

¹ The parish of Norton and part of parish of Willian transferred to that of Letchworth in 1908.

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consisted of one member for each of the three parishes of Letchworth, Norton, and Willian.

In the year 1908 an additional member was given to Letchworth, and in 1909 six seats were allotted. At first the rural district council found its work in connection with the rapidly rising town a little onerous and unusual, but it soon adjusted itself to the new position. The council's building by-laws left unusual liberty and freedom for experiments in erection and construction of buildings, and its building committees were exemplary in their rapid approval of plans. At the present time a joint committee of the rural district council and the parish council of Letchworth conveniently deals with certain matters affecting the town. The county council has, from the first, generously met the requirements of the new community as they arose.

HERBERT WARREN,
Solicitor to First Garden City, Ltd.

APPENDIX H

HOW FAR HAVE THE ORIGINAL GARDEN CITY IDEALS BEEN REALISED ?

BRIEFLY my reply to this question is : My ideals have as yet been realised only to a small degree, but I plainly see time and its evolutionary processes fighting ever on my side.

The object of my book, *Garden Cities of To-morrow*, was, first, to urge that a body of public-spirited persons should build a new town away in the open country as a practical step towards an extensive "back-to-the-land" movement. The building of the first Garden City was to be followed by the building of a group of towns, each town to be permanently surrounded by open country : the whole group to be so planned and administered as to form in the aggregate a city more healthy and truly prosperous than any city in the whole world, and this because that city would represent the highest form of combined human skill and endeavour, urged forward by a deep desire for justice and a true regard of man for man ; and also because the enterprise being carried out on a relatively clear field, wise efforts would be but little hampered by the follies, mistakes, and injustices of the past.

Even the former task—that of building one new town in the open country—is as yet far from complete, while the time to enter upon the latter task, that of building a group of towns, may still perhaps be some decades off. So that it is obvious that my ideals are yet very far from complete realisation : but still it may perhaps be interesting briefly to contrast the present state of the public mind towards my proposals with the state of mind with which they were received when first put forward.

A distinguished English philosopher, still living, to whom I sent my book soon after its publication (1898), replied solemnly, "The days of Alexander the Great and Philip II. are over, and men

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no longer build cities : " and many other writers expressed themselves in his fashion, " Cities grow : they are not created "—the general impression being that I was a fantastic dreamer, and that deliberate city-building was quite beyond the skill of man, at least in an old-settled country.

That state of mind with regard to the planning of towns is hardly possible now, partly because of Mr. T. C. Horsfall's insistence on our following " the example of Germany ; " partly because of pioneer work done at the villages of Bournville and Port Sunlight ; partly because of the yet more comprehensive work done at Letchworth. And at last the timid and narrow notion that the man of the twentieth century is to be for ever hampered, baffled, and controlled by the follies and injustices of our forefathers, when expressed in our towns and cities, is gradually giving way to larger conceptions and to more statesman-like enterprises.

On the other hand, one of the most disappointing experiences we of the Garden City have is that in the minds of the public and of writers in the press the idea of building entirely new well-planned towns right away in the open, with their own parks and open spaces, their own agricultural belts, their own schools, churches, theatres, and other public buildings, their own gas, electricity, water, sewerage, their own industries, and their own local government, in short, their own active corporate life, is frequently confounded with a very different idea—that of building " garden suburbs," that is, extensions, certainly often much improved extensions, of existing towns ; extensions sometimes of cities which it would be much better should not be extended. Indeed, the term " Garden City " is often applied to a few well-planned or ill-planned streets and squares and garden-surrounded cottages, the dormitory of some other community.¹ But surely this disappointment can only be temporary, and ere long the really comprehensive experiment now being carried out at Letchworth, on an area seven times as large as the old walled-in City of London—an area which ten years ago was being more and more deserted by its peasantry—will

¹ I have before me the prospectus of a so-called " Garden City " of 9 acres, and another which is nothing but a poor attempt at speculative development, with gardens of the smallest.

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compel the people of England at length to realise what splendid possibilities are locked up in large areas of our land now almost destitute of inhabitants, and inspire them with a determination to make those possibilities actual, and thus to bring forward untold treasures of health and well-being.

At this point I will ask the reader to notice that in *Garden Cities of To-morrow* I described the Garden City as a completed town and of set purpose avoided all reference to the difficulties which I well knew would certainly attend the initial stages of the enterprise.

What those difficulties would be I did not, of course, entirely foresee ; but one difficulty (in a rich country not necessarily inherent in such an enterprise) showed itself at an early stage of our practical work. That difficulty was a financial one. The First Garden City Company purchased an estate of 3818 acres—since increased to 4500 acres—at a cost of £150,000, and it asked for a subscribed capital of £300,000—a sum small enough, surely, with which to start upon such a big task ! But such was the British public's lack of confidence in ideas that the company actually had to go to allotment with only £75,000, and, therefore, at the outset of its enterprise it had to mortgage the whole of its property !

But the directors determined to go on in spite of this very inadequate support, for its shareholders were quite willing to take risks, and were convinced that the appeal of a vigorous living enterprise, aiming in an entirely peaceful and constitutional and eminently practical fashion at the public well-being, could not long fail of adequate response, and that many would be certain to support the movement at a later stage.

Nor in this were the directors entirely disappointed, though their difficulties at the outset were greatly increased, not only by lack of capital, but because energies that should have been entirely devoted to the carrying out of the enterprise were diverted to the sordid task of raising money. Space will not permit that I should point out how much better things could have been done but for this financial difficulty.

In my book I described a system of rate-rents (that is, a system of rents intended to cover also rates) as being in actual operation ; and the First Garden City Company at the outset made a sincere

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effort to establish such a system, but those efforts were practically unavailing. This was, however, not so much in consequence of any inherent defect in such a system—although I now believe it is not altogether free from defect—as because the time had not come when it could be fairly tried, for this could only be done when the town was quite successfully and permanently established and with a large well-secured and wisely-expended revenue. The original scheme was that the leases should provide for the payment of a certain initial rent ; that the rent should at, say, the end of seven years be revisable ; that the land (apart from buildings) should then be revalued ; that if the value of the land had gone up the rent should be raised ; if it had gone down the rent should be lowered. Lawyers, however, advised their intending leaseholder clients against such a system, on the ground that with such a clause in the lease it would be difficult to sell. Prospective mortgagees also objected. And so the idea of revisable leases was dropped in favour of leases with more customary terms—though it is, as I have said, quite possible that at a later stage some modification of the present system may be tried.

Quite apart, however, from any point of this kind there can be no doubt that the path for a great national social advance is clearly pointed out by the very successful enterprise now being carried out at Letchworth, where the ownership of a large urban and rural area is vested in one corporation. Surely the nation must follow where a few public-spirited people have thus shown the way ; and when similar, but yet bolder, enterprises are carried out by the aid of public money, lent by the state at, say, $3\frac{1}{2}$ or $3\frac{3}{4}$ per cent., then still greater benefits will accrue to the people of the new towns ; and those new towns must in their turn have, by the force of their example, a markedly beneficial effect upon all existing villages, towns, and cities—thus raising the standard of life of the entire nation.

There are two temporary disappointments which I have much more keenly felt than the failure of my rate-rent proposal. The first of these is with reference to the shopping system of Letchworth. This is now very much on conventional lines—not at all what it might have been if sufficient imagination and enterprise had been

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brought into play. The founding of a new town afforded a fine opportunity which the Co-operative Wholesale Society should have availed itself of to the utmost ; and I did my best to urge them to do so. But the splendid faith of the pioneers of the co-operative movement did not appear to animate the then managers ; they shared rather in the general scepticism, and regarded the First Garden City as a well-nigh hopeless experiment, and so took no active part in it. But when a second experiment comes to be tried in the near future, if the Co-operative Wholesale Society does not quickly come forward with a really bold scheme, and with ample capital to carry it out, then a subsidiary company or society should be formed at the very outset, for the purpose of supplying the future townspeople with everything they may want at little over cost price. For it is of vital importance to the well-being of the people that the purchasing power of money should be made as high as possible ; and to this end waste must be kept down to the minimum.

It is quite true that the rents derived from the letting of shop sites might be by this plan reduced ; but that would be but a very small matter as compared with the tendency to more rapid development of the town, which would follow from low prices. Under such a system, too, the whole body of distributors might enjoy shorter hours and better and more secure employment, while the chief shopping quarter of the town might be made vastly more interesting and attractive.

Another disappointment—which can, however, be more readily converted into ground for future hopefulness—is that in Letchworth there is, in my opinion, not a sufficient number of productive enterprises carried on by combinations of workers in the interests of workers, a method of industrial reform which is, I believe, destined to play an enormous part in allaying unrest and in peacefully introducing a higher social order. With all respect to the leaders of the great working-class movement, and to the advocates of social reform generally, it appears to me that they are making a profound mistake in directing almost their entire energies to the control of industries *from outside*, either by the state or by trade-union action, to the comparative neglect of that simpler, more direct, and complete control of industry *from the inside*, which they could

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secure if they took a really active part in establishing, controlling, and extending manufacturing enterprises for producing goods required by the working people themselves. Such enterprises should be run, not so much with a view to profit—though it would be necessary, of course, to pay something for the use of capital—as with a view to producing articles of sound quality at low prices, paying always at least the trade-union rate of wages common in such industry, and not only conforming to the best-known conditions, but seeking to raise their standard. This is, I know, already done on a small scale in various places ; and it must prove, apart from every other consideration, of immense educational value to the workers themselves. Enterprises of this type would be but the natural complement of the work done by the Garden City Company, and by the subsidiary societies engaged in cottage building ; and they would, if well carried on, directly increase the purchasing power of the community. Nor need the establishment of such industries as I have referred to for supplying “wage goods” involve competition with the enterprises now existing at Letchworth, or with others of a similar nature which might be attracted there. Quite the contrary might be the effect. For as the existing industries are only to a very small extent engaged in producing “wage goods,” and as their products are chiefly sent to outside markets, industries producing “wage goods” would be distinctly helpful to the existing industries, for they would increase the purchasing power of the workers who are engaged in them and thus tend to render Letchworth more than ever popular, alike to employer and employed.

I cannot conclude these few observations without expressing my heart-felt thanks to all those who have in so many ways, and so untiringly, helped forward the Garden City ideal. In doing this they have helped us all to see with clearer vision than we could have seen but for work well begun, work which I am sure will be better continued, work to which one can see no final end, for whatever realms man conquers there are illimitable fields beyond.

EBENEZER HOWARD,

Author of “Garden Cities of To-morrow.”

APPENDIX J

GARDEN CITY AND THE TOWN- PLANNING MOVEMENT

So far there exists but one Garden City established on the full lines of Mr. Ebenezer Howard's noble plan. The notes of Mr. Howard's policy, as they are exemplified at Letchworth, are that a Garden City proper should be a new settlement designed to solve at once the twin problems of urban congestion and rural depopulation. A large agricultural estate is acquired and it is laid out on lines suited to the needs of its fullest ultimate development. Suitable areas are set aside for industrial and residential purposes and for purposes of recreation, and a great belt of land is reserved for ever for the farmer, market gardener, and small-holder. Here it is not a case of the orderly planning of the suburbs of an already existing town. It is the creation of an entirely new centre of population in close association with an agricultural population, largely dependent, it may be, on the Garden City itself as a market for its produce.

Garden Cities are not built in a day. We may well hope with Mr. Howard that other Garden Cities than Letchworth will spring into being within the course of the next few years, especially in view of the now admitted financial success of Letchworth itself. However this may be, Letchworth has offered and continues to offer a priceless object lesson in the advantages of town-planning, for it is a prime virtue of Mr. Howard's policy that it is applicable in part to town-planning schemes of every kind, no matter how far short they may fall of the great ideal.

It is not too much to say that Letchworth is the Mecca of town-planners all over the world. If a local authority is about to embark on a town-planning scheme ; if a landowner seeks information as to the best means of laying out a building estate ; if the proprietors

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of a new coal mine are anxious to avoid the distressing conditions of housing that prevail in South Wales and the Black Country—they repair for guidance to Letchworth or to the Garden Cities and Town Planning Association which preaches its gospel.

Already, as the firstfruits of the foundation of the Garden City, there are in course of development in Great Britain more than forty garden suburbs and industrial garden villages. In and around London as many as ten such projects are on foot. Of these the chief is the Hampstead Garden Suburb. The most casual visitor to this suburb cannot fail to be impressed with the advantages of its planning. The contrast between it and the melancholy suburban developments that have taken place in the past at any point of the compass round our towns and cities is little less than startling. The strict limitation of houses to the acre, the grouping of the principal buildings round a central area, the generous provision of open spaces and playgrounds, the preservation of every natural feature of æsthetic value, the lay-out of the roads, the architecture of the houses—by all these signs it is immediately recognised that wise and sympathetic minds have been at work at Hampstead, and that one of the most important of human concerns has not been left to the caprice of the speculative builder. There are prospects in the Hampstead Garden Suburb that are as attractive as any to be seen in the most beautiful villages in England. Or go to Romford, or Ealing, or Ruislip, or Knebworth. Directly or indirectly, in each of these cases inspiration has been drawn from Letchworth and from the modest volume *Garden Cities of To-morrow*, which more than any book written in modern times has modified public opinion and public practice.

Of the many garden suburbs and industrial garden villages now in course of development in England, Scotland, and Wales, it is not possible to write in detail. For our present purpose the garden villages that have been established in connection with individual works, factories, or collieries must be regarded as claiming special consideration. That the suburbs of the comparatively well-to-do should be well and wisely planned is a most desirable thing. The problem, however, that Mr. Howard set out to solve is more particularly the problem of the better housing of the wage-earning

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classes. What has been the practice in the past? The opening of a new colliery or the establishment of a great manufacturing enterprise has brought together capital in large sums and technical skill and knowledge of the highest order. Everything that business experience and human ingenuity have been able to devise has been done in order to ensure a financial success. Machinery, plant, means of transport and communication—every one of these details has been explored and pondered over with that far-sighted care which characterises modern industrial enterprise. One consideration there has been, however, that has never perhaps engaged for a single moment the attention of the promoters of the enterprise. Where and under what conditions are the colliers or operatives to live? Yet this surely is not the least important question. The state itself has been remarkably slack in this regard. The dockyard at Rosyth is a case in point. Though it was certain from the first that thousands of men would ultimately be employed at Rosyth, no definite arrangements were until recently made by the Admiralty for their suitable accommodation. If it is too much to expect that the great spending departments should provide housing accommodation for the people they employ, there would seem to be room for a special state department, or, better still, for a department within the Local Government Board, to devote itself to this essential business.

Private employers are setting the state a good example. In this connection the example of the Cadburys at Bournville and of Sir William Lever at Port Sunlight will ever be held in grateful remembrance by town-planners all the world over. They have been followed by the Rowntrees at Earswick, by Sir Arthur Markham at Woodlands (near Doncaster), and by Sir James Reckitt and Mr. T. R. Ferens at Hull. It is perhaps not invidious to mention as further admirable examples the industrial housing development carried out by co-partnership societies, the Harborne Tenants, Sealand Tenants (near Chester), the Anchor Tenants (Leicester), Glasgow Garden Suburb Tenants, and Liverpool Garden Suburb Tenants. It is gratifying to note that in South Wales, a part of the country that has long enjoyed an evil pre-eminence in the matter of bad housing, the town-planning movement is now making vigorous advance

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under the auspices of some of the ablest capitalists of the principality. Industrial garden villages or suburbs have been commenced at Ynysybwl, Whitchurch, and Merthyr Tydvil, as well as in connection with some of the new collieries in the neighbourhood of Newport, while the city of Swansea has prepared a plan for the development as a garden suburb of a large area owned by the city. In North Wales also a beginning is to be made at Wrexham. We may confidently trust that Mr. Howard's appeal will continue to exercise an ever-increasing influence on the imaginative people of Wales.

I have referred to the work of the Garden Cities and Town Planning Association.¹ This association, which depends entirely on voluntary contributions, was founded by Mr. Howard in order to assist him in establishing the Garden City at Letchworth. This great work having been successfully accomplished, and pending the inception of other schemes on strict Garden City lines, the association lends its services to the promotion of town-planning in all its various phases. By means of practical advice and lectures, and by undertaking town-planning tours and conferences at home and abroad, the association works busily to advance the principles embodied in Mr. Howard's writings. The secretary of the association, Mr. E. G. Culpin, has just completed a successful lecture tour in the United States. I am indebted to the acting secretary, Mr. Charles Reade (who is to undertake a similar campaign in Australasia and New Zealand at no distant date), for an analysis of the correspondence received at the office of the association during the first two months of this year (1913). Nothing could illustrate more forcibly than such an analysis the extent and range of the interest that has been excited by the example of Letchworth. Letters have been received from Dublin, Edinburgh, Manchester, Liverpool, Birmingham, Nottingham, Tamworth, Ramsey, Hendon, Luton, Beckenham, Kirkcaldy, Glastonbury, Keswick, Rugeley, Mansfield, Lincoln, Ipswich, Bradford, Gloucester, Huddersfield, Frinton, Harrow, Coventry, Surbiton, Durham, Chesterfield, Drogheda, Cork, Coleraine, Dunfermline, Derby, Southampton,

¹ The Garden Cities and Town Planning Association, 3 Gray's Inn Place, London, W.C.

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Blackburn, Bolton, York, Doncaster, Rochdale, Perth, Chester, Warrington, Ramsgate, Cambridge, Norwich; from Cape Town, Durban, Johannesburg, Pretoria; Melbourne, Sydney, Adelaide, Kalgoorlie; Christchurch (N.Z.), Auckland (N.Z.), Opotiki (N.Z.); Montreal, Toronto, Winnipeg, Halifax (Nova Scotia); Bombay, Baroda State; from New York, San Francisco, Boston, Lomax, Providence, Brooklyn, Philadelphia, New Britain (U.S.A.); from Berlin, Paris, Budapest, Bucharest, Brussels, Antwerp, Ostend, Göttingen, Riga, Warsaw, Buenos Ayres; and so on and so on. The list is an almost wearisome one. Inquiries are chiefly for literature, lectures, lantern slides, and advice as to estate development and housing schemes. From Barcelona comes a request for advice as to the formation of a Garden Cities Association and as to a proposed tour of investigation in England. Winnipeg wants a hundred lantern slides. Ghent seeks assistance in preparing a town-planning exhibit at the International Congress of Town-Planning and Municipal Organisation, and Leipzig is proposing a similar exhibit at a Housing Exhibition. From Darjeeling is an application for literature and plans, and a similar application comes from Trinidad. The railway department at Canton asks for information on cheap housing, and Toronto advice as to the formation of a Garden Cities Association. Very often inquiries are addressed direct to the First Garden City offices at Letchworth. "It was only the other day," said Mr. Raymond Unwin in the course of a recent public address, "that the Federal Government of Australia sent over for the plan of Letchworth to be forwarded as quickly as possible, because they are considering the new capital. In the same way the city of Boston sent over a long list of questions, asking for the experience that had been gained in Letchworth and in similar movements in England." It may be added that of the eminent town-planners commissioned by the government of India to plan the new capital at Delhi, one of them, Mr. Edwin Lutyens, A.R.A., has been intimately associated with the Hampstead Garden Suburb.

Well might Mr. Alderman Thompson, chairman of the National Housing and Town Planning Council, say in connection with the banquet given last year in Mr. Howard's honour, that "this experiment (Letchworth) has afforded inspiration to reformers all over

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the 'world.'" In the same connection Baron d'Estournelles de Constant, president of the French Garden Cities Association, referred to the "splendid services rendered to all nations by Mr. Ebenezer Howard," and Herr Bernard Kampffmeyer, president of the German Garden Cities Association, to his "great work for humanity." For the influence that emanates from Letchworth is bound by no restrictions of frontier or race. In a space of time almost incredibly brief—the first edition of Mr. Howard's book was published in 1898 and Letchworth itself was founded in 1903—the attitude to the housing question of enlightened men among all civilised peoples may be said to have undergone a profound transformation.

In our own country an immense impetus has been given to the town-planning movement by Mr. John Burns's Housing, Town Planning, etc., Act of 1909. Passed, it may truthfully be said, with the warm approval of all parties in Parliament and administered with rare discretion and sympathy by Mr. Burns, this Act may well prove in history to be the most generally beneficial legislative measure of our time. I am indebted to Mr. Burns himself for an authoritative statement as to the working of the Act in England and Wales up to the end of May of this year.

The Corporation of Birmingham have the honour of carrying through the first town-planning scheme under the Act, the Quinton, Harborne, and Edgbaston Scheme prepared by that corporation having received the final approval of the Board on May 31, 1913.

Three other schemes have been prepared and submitted to the Board for approval, and in thirty-four other cases authority has been given by the Local Government Board for the preparation of town-planning schemes. In nine other cases application has been made for authority to prepare schemes. In all, nearly 70,000 acres are included in these schemes. Including these cases the Board are aware of nearly 150 local authorities who have under consideration the question of the preparation of town-planning schemes, and there are no doubt other authorities who have the matter under consideration, but who have not yet found it necessary to communicate with the Board.

As regards loans for housing purposes, the Local Government Board has sanctioned under Part III. of the Housing of the Working

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Classes Act, 1890, as amended by the Act of 1909, in the three and a half years to June 14, 1913, loans to urban authorities to the amount of £735,000, and to rural authorities to the amount of £139,000. Further loans (£317,000 to urban and £90,000 to rural authorities) are under consideration by the Board. Again, the Act of 1909 extends the powers of the Public Works Loan Commissioners under the Act of 1890 to lend to public utility societies or private persons in respect of the erection of working-class dwellings. The amount so advanced in the four years ending March 1913 was nearly £750,000. Moreover, the procedure set up by the Act of 1909 has enabled vast numbers of insanitary houses to be made fit for human habitation. In the first two years after the passing of the Act no less than 72,000 representations were made to local authorities as to unfit houses. In the year ending March 1912 alone, 47,000 houses were made fit by landlords or owners without cost to the rates, by procedure under the Act of 1909.

These surely are remarkable facts, and a warm tribute is due to Mr. Burns and to the department over which he presides for their great share in the advancement of what may fairly be regarded as the most important branch of social endeavour of our day. Happily, in this case, state enterprise and private enterprise go hand in hand. Still more happily, the question is not one that excites political passion. Opinions may differ—they do, in fact, differ acutely—as to the best means of providing housing accommodation in town and country, but the ideals that have taken concrete shape at Letchworth are cherished by adherents of all the British political parties. Not less are they acceptable to men of every race and of every political creed in the world at large. The particular friends of Letchworth rejoice in the established success of the first complete example of a Garden City. If financial success had been indefinitely postponed, still the promoters of the experiment must have found abundant justification for their splendid enterprise in the inspiration and stimulus it has afforded to town-planners all over the civilised world.

CECIL HARMSWORTH,
*Chairman of the Council, Garden Cities and
Town Planning Association.*

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APPENDIX K

(I.) THE GARDEN CITY BUILDING REGULATIONS

It has been pointed out in the course of this book that Garden City, having no statutory powers beyond those possessed by any landlord under the ordinary law of the land, depends entirely upon its position as ground landlord for control over the development of the town and the buildings erected in it. The Garden City Company have, therefore, drawn up a series of building regulations which must be complied with by all who build upon their estate. The regulations, not being in the nature of by-laws, can only be enforced under the terms of the leases and agreements granted by the company. They are in accord with, and include, the building by-laws of the local authorities in force in the district, but, as might be expected, they go very much further than those by-laws, and some of the clauses are novel and interesting. It is not possible, neither is it necessary, to reprint the whole of the regulations here, but it has been thought worth while to give those clauses which may be of special interest to readers of this book.

BUILDING REGULATIONS ISSUED BY FIRST GARDEN CITY, LTD.

INTERPRETATION OF TERMS

i.—iv. "Town Area" means that part of the estate of the company at Letchworth which is coloured pink on the plan marked "Plan referred to in the building regulations of First Garden City Limited" and deposited at the offices of the company.

v. "Suburban Area" means that part of the estate of the company at Letchworth which is coloured brown on the said plan.

vi. "Country Area" means the remaining portion of the estate of the company at Letchworth coloured yellow on the said plan.¹

¹ These clauses are interesting because they represent a tentative application of the German "Zone" system of by-laws.

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PLANS TO BE SUBMITTED BY INTENDING BUILDERS

3.—The following plans, etc., will be required to be submitted, and must be approved by the company before any buildings are commenced.

(a) A block plan of the plot to a scale of 41.66 feet to one inch (1/500), showing the position of the buildings, including outbuildings and offices, drains, sewers, and connected with sewers, boundary walls, roads, drives, and fences, if any. (The company will usually provide a tracing of the plot from which the plan can be prepared.) There must be shown on the block plans the position and frontage line of any existing buildings on the adjacent plots.

(b) Complete plans of each floor of such building, with elevations of every side, and such sections as may be necessary to explain the character of the building and to show the nature of the foundations and the dimensions of timbers, footings, walls, and the opening windows, to be drawn to a scale of not less than eight feet to one inch. Such plans and elevations to show by colouring or otherwise the character and distribution of the materials to be used.

(c) An abstract of the building specifications sufficient to properly describe the buildings and the character and quality of the materials to be used and the works to be executed. (The company will provide a form for this.)

(d) The company will retain the plans and specifications submitted. Cloth tracings in ink, or permanent black line photo prints, will be accepted.

BUILDING AREAS

4.—A building area is given as a general indication of the area within which buildings must be placed, but the company reserves the right to prescribe more exactly the position of that building area, nor is the company to be debarred by the fixing of an area from allowing buildings outside that area when in their opinion this is desirable. In certain cases a building line will be fixed, and the position of all buildings must be subject to the company's approval.

5.—The company reserves the right to define in each case the maximum proportion of a site which may be covered with buildings and the minimum amount of ground which must be provided with each dwelling-house. Subject to variation for certain sites, or for sites in the central town area, the following rules will be required to be complied with :

(a) In the case of houses, not more than one-sixth of the site may be covered with buildings ; in the case of shops and warehouses, not more than one-third of the site may be covered ; in the case of corner sites, one-half of the site may be allowed to be covered by buildings, if the building is a shop or other building used for business purposes.

(b) Dwelling-houses costing less than £200 may not exceed 12 to the acre.

Dwelling-houses costing £200 but not more than £300 must not exceed 10 to the acre.

Dwelling-houses costing £300 but not more than £350 must not exceed 8 to the acre.

Dwelling-houses costing £350 but not more than £500 must not exceed 6 to the acre.

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Dwelling-houses costing £500 or upwards must not exceed 4 to the acre.

(c) The measurement must be taken on the net area of the building plot, exclusive of roads ; but gardens or greens common to the cottages or devoted to public enjoyment, if forming part of the plot and immediately adjacent to any set of houses, may be included in the area for determining the maximum number of houses allowed.

6.—Each dwelling-house intended for a family must contain at least one living-room, having a floor area of not less than 144 square feet, and containing not less than 1080 cubic feet of air space ; it must have one bedroom having a floor area of not less than 135 square feet, and containing not less than 1070 cubic feet of air space, and no bedroom must contain less than 500 cubic feet of air space.¹

DESIGNS

7.—The elevations of all buildings must be to the satisfaction of the company.

The company, while desiring to leave as much freedom as possible to designers, draws attention to the following points :

(1) A sunny aspect for living rooms should be secured.

(2) Where outbuildings are used they should be so placed as not to block the outlook from the dwelling-houses or present an objectionable appearance from other dwelling-houses. It will generally be found most successful to design them as part of the main building.

(3) Most buildings in Garden City will be open to view on all sides, and should be treated accordingly, the sides and back being built of materials as good as the front.

(4) All buildings must have their walls and roofs constructed of approved materials.

(5) For walls, approved bricks, stone, roughcast, or concrete are generally accepted as facing materials ; for roofs, red tiles are the covering always accepted. Other materials are subject to the approval of the company in each individual case.

(6) The company do not ask for elaborate elevations ; they will be satisfied with simple designs, but attach importance to the proportions of buildings and their parts, also to their suitability to the town generally, to the particular site, and to the other buildings in the vicinity.

TEMPORARY STRUCTURES, GARDEN HOUSES, ETC.

15.—Every person who shall desire to erect a temporary building, office, workmen's shed, summerhouse, greenhouse, garden house, fowl house, or other similar building, must submit plan and particulars, and obtain permission from the company before doing so, and must construct such building of such a character, and in such a position, as the company may approve, and the company reserves the right to disallow the erection of any particular buildings, or their erection, in any particular place.

¹ Nothing is said about the height of rooms because the cubic contents are considered to be of greater importance.

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GARDENS

17.—(a) The garden attached to every house shall be dug over, laid out, and planted sufficiently to contribute in a reasonable degree to the amenities of the situation so soon as practicable, taking into account the season of the year when the building is completed. If after due notice has been given on the part of the company the garden is not reasonably dealt with, the company shall be entitled to do what is necessary to put the garden in reasonable order, and to recover the cost of so doing from the lessee. The requirements are not intended to prevent land already in grass from being so left if desired, provided the grass is cut reasonably often and weeds detrimental to neighbours' gardens are not allowed. As it is essential to preserve the top soil of the garden, excavated material where unsuitable for garden must not be spread upon it; the company will usually be able to provide convenient tips for excavated material.

FENCES

18.—Designs for boundary fences and entrance gates proposed must be submitted, and shall be subject to the approval of the company, and where plots are adjacent on any side to agricultural land an effective post and rail or other approved fence must be erected, and the company reserve the right to require that any plots shall be completely fenced.

(a) The company require fences to be erected between the building plots and the roads, except under special circumstances.

(b) So long as neither of the lessees of adjacent plots desires any fence between the plots, the company will not require any fence to be erected; but if and whenever either of the lessees of adjacent plots desires a fence to be erected between these plots, such fence shall be provided by the lessee to whose plot such fence is marked on the lease plan as belonging, or in the case of a party fence such fence shall be provided by the lessees jointly, and each lessee shall contribute one half the cost of the fence. Such fence shall, except by special permission of the company, take the form of a hedge of approved character.

(c) If either of the lessees of adjacent plots desires to erect a temporary fence, pending the growth of the hedge as described above, he must erect such fence at his own expense, or by agreement with the adjacent lessee at their joint expense, such fence to be subject to the approval of the company.

(d) Every fence or hedge shall be planted wholly upon the ground of the lessee to whose plot such fence is shown on the lease plan to belong. In the case of a party fence it shall be planted or placed on the boundary line between the plots.

(e) No fence may be erected or allowed to grow to a greater height than six feet from the ground, except by the common consent of the adjacent plot holders, and subject to the approval of the company.

(f) The company reserve the right to make special regulations as to fences in certain roads, and to require that no fences be erected along certain roads.

(g) All entrance gates must be so hung that they open entirely upon the lessee's own land.

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SIGNS

19.—All signs, notices, or advertisements shall be subject to the approval and permission of the company in writing; and the company reserve the right to forbid the display of any such signs, notices, or advertisements of which they do not approve.

WALLS

[The regulations dealing with the construction of walls are too lengthy to be reprinted here. It may be said, however, that they are an improvement on those usually adopted by local authorities, as they allow for the use of concrete blocks, half-timber work in gables, etc. They are similar in many of their provisions to the new by-laws recently suggested by the Local Government Board for adoption by local authorities. The regulations contain conditions safeguarding buildings against fire.]

ROOFS

66.—Every person who shall erect a new building shall cause the flat and roof of such building, and every turret, dormer, lantern-light, skylight, or other erection placed on the flat or roof of such building to be externally covered with tiles,¹ metal, or other incombustible materials, except as regards any door, door frame, window, or window frame of any such turret, dormer, lantern-light, skylight, or other erection.

Provided always :

- (a) That the use of materials other than incombustible materials may be permitted on dormers, turrets, or other minor parts of buildings which may be sufficiently distant from adjacent buildings if, in the opinion of the company, the risk of communicating fire to adjacent buildings is not thereby increased.
- (b) That in the suburban or country areas where a new building intended for use as a dwelling house shall be distant not less than *thirty feet* from any other building not being in the same curtilage, or where a new building forms or is intended to form part of a block of new buildings which shall be intended to be used as dwelling houses and shall not exceed three in number, and each of which shall be distant not less than *forty feet* from any adjoining building not being in the same curtilage and not forming part of the same block, the person erecting such new building may cover its roof with thatch, wood shingles, or other materials, other than incombustible materials, which the company may approve.

WITH RESPECT TO THE SUFFICIENCY OF THE SPACE ABOUT BUILDINGS TO SECURE A FREE CIRCULATION OF AIR²

68.—Every person who shall erect a new domestic building shall provide in the rear of such building an open space exclusively belonging to such building, and of an aggregate extent of not less than one hundred and fifty square feet, and free from any erection thereon above the level of the ground

¹ Cf. Clause No. 7, Section 5, above.

² Cf. Clause No. 5.

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except a water-closet, earth-closet, and an ashpit, constructed respectively in accordance with the regulations in that behalf.

- (a) In the case of a domestic building not being a building intended and adapted to be used exclusively as a stable he shall cause such open space to extend throughout the entire width of such building, and he shall cause the distance across such open space from every part of such building to the boundary of any lands or premises immediately in the rear of the site of such building to be not less in any case than ten feet.

If the height of such building be fifteen feet he shall cause such distance to be fifteen feet at the least.

If the height of such building be twenty-five feet he shall cause such distance to be twenty feet at the least.

If the height of such building be thirty-five feet or exceed thirty-five feet he shall cause such distance to be twenty-five feet at the least.

- (a¹) The above clause shall apply to the return walls of any back addition or projecting portion of a building. The intention of this clause is to prevent the erection of back projections and domestic offices which thereby form a small court to which sun and air have very little access.

VENTILATION OF PUBLIC BUILDINGS

74.—Every person who shall erect a new public building liable to be used for public meetings shall cause such building to be provided with adequate means of inlet and outlet ventilation independent of door and window openings. *Also with adequate means of heating on a system approved by the company. The company wish it to be understood that they attach considerable importance to the ventilation and heating of buildings which are to be used or liable to be used for public meetings and purposes. It is essential that reasonable ventilation should be so provided as to be independent of doors and windows.*

Adequacy of ventilation will depend on the system adopted and other circumstances, but under ordinary circumstances with natural ventilation a building does not contain reasonably pure air unless there are a large number of inlets for fresh air aggregating twenty square inches for each person present, and outlets of one-third this area.

Engineering authority, represented by Mr. Francis Fox, M.Inst.C.E., states emphatically that this amount "should not be regarded as by any means absolutely satisfactory. It is low and ought to be exceeded. It is only admissible for audiences occupying the room for a comparatively short time."

In his report to the National Association for the Prevention of Consumption he gives the amount of air really required for health as more than double this.

Public health authorities also agree in this estimate.

The best level for air inlets in the room is usually about five feet above the floor.

Windows as ventilators are not sufficient as the incoming air should in winter be slightly warmed. This can be simply arranged by casing the radiators to about five feet in height and letting the air in at the base of the casing and out (into the room) at the top.

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The ventilation should be arranged so that the openings to the outside are not conspicuous or easily tampered with. Hence shutters closing the inlets should be outside the building. The area of inlet should be sufficiently ample to allow of using only those on the leeward side when a cold wind is blowing.

WITH RESPECT TO THE DRAINAGE OF BUILDINGS

79.—Every person who shall erect a new building shall, in the construction of every drain of such building, other than a drain constructed in pursuance of the regulation in that behalf for the drainage of the subsoil of the site of such building, or for the conveyance of surface water only,

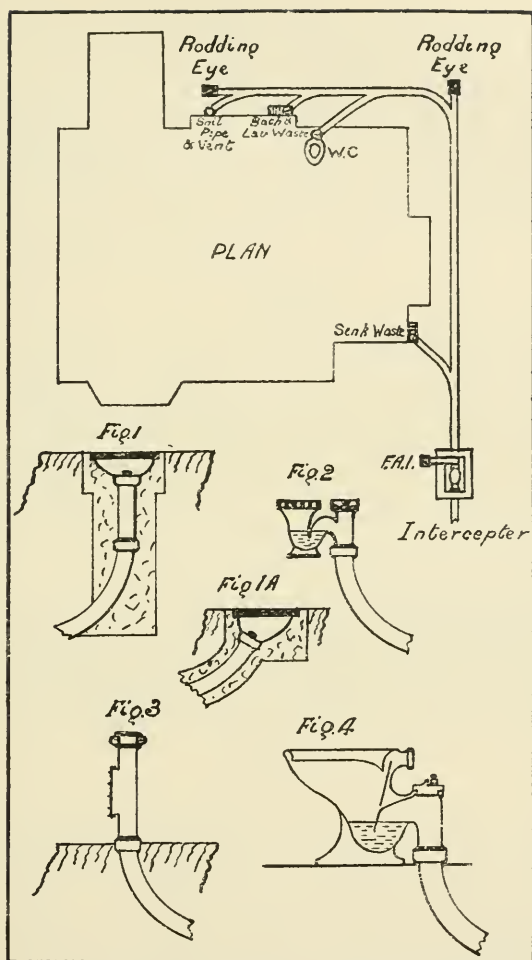
ix. Cause provision to be made by means of manholes or of “rodding eyes” to the satisfaction of the company for effectually rodding and cleaning every such drain other than a single short branch from a gulley or vent-pipe.¹

81.—Each dwelling-house or other building must have a separate connection to the sewer.

The company reserve, however, the right to grant exception to this regulation in certain cases where they are satisfied that the expense of the separate drain would be excessive in proportion to the advantage. Exceptions will be likely to be approved :

- (a) In the case of two or more dwelling-houses built in one group of a value not exceeding £300 each, provided (I.) that not more than four such dwelling-houses must be served by one drain, (II.) that at each end of each distinct length of such drain satisfactory provision be made for rodding and cleaning in the manner previously described, (III.) that adequate ventilation be provided for throughout the drain.
- (b) In the case of semi-detached houses, or of two adjacent houses, of a value not exceeding £350 each, where the distance from the disconnecting trap on the boundary of the premises to the point where the whole of the drains from the two houses could unite in one sewer is not less than thirty feet, provided (I.) that not more than two houses must be served by such a drain, (II.) that the drains of the second house must be collected and joined to the drain from the first house in a manner, as described previously, at a point beyond which no junction with the drain need be made, so that the length of combined drain may be a straight length of unbroken sewer without any additional connection, (III.) that ventilating shafts of sufficient diameter be provided for each house, and inlet ventilation be provided in proportion to the number of shafts.

¹ At the date when these regulations were last revised the “rodding eye” system of house drainage was in an experimental stage. The system was designed by Mr. S. H. Donnelly, of the company's staff, whose object was to provide a more efficient and less costly method of drainage than was possible with the older practices. He succeeded in this by eliminating manholes and providing better access to the drain from the ground level by rodding or cleansing eyes. The new method has been found to have many advantages, both sanitary and economic. It is so much less costly to install and maintain, and is so successful in many other ways, that it is now the only method of house-drainage permitted at Garden City. The accompanying diagram shows the system applied to a single house ; it is largely used, however, for blocks of workmen's cottages.



The Rodding Eye System of House Drainage.

Fig. 1.—Deep Rodding Eye.

Fig. 1A.—Shallow Rodding Eye.

Fig. 2.—Rodding Eye at Gulley Branch.

Fig. 3.—Rodding Eye at foot of Soil Pipe.

Fig. 4.—Rodding Eye to ground floor W.C.

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- (c) In the case of semi-detached houses, or of two adjacent houses, where the distance from the disconnecting trap to the point of junction as described above is less than thirty feet, or where the value of the houses exceeding £350 does not exceed £500, one disconnecting trap, manhole, and connection to the sewer in the road may be permitted, provided (I.) that not more than two houses are served by such connection, (II.) that the manhole be situated on or adjacent to the boundary line between the two properties at the point where the sewer leaves the property, (III.) that adequate ventilation be provided as described above.

N.B.—In all cases such exceptions must be arranged to the satisfaction of the company, and will be subject to the approval or otherwise of the local authorities.

86.—When a sewer is not reasonably accessible from a building, one of the following methods must be adopted :

- (a) A complete septic tank, or filtration system, which will deliver a pure affluent to the satisfaction of the company, must be constructed.
(b) Some approved system of earth-closet must be provided, and the slop-water from baths and sinks only collected in a cesspool.
(c) Where, in the opinion of the company, the position of the site and the nature of the ground are favourable, and a sufficient area of ground immediately adjacent to the drain is available, "Dr. Poore's," or other similar systems for dealing with the slop-water drainage within the bounds of the plot, may be permitted. But special permission must be obtained ; and this will not usually be granted on sites smaller than one-eighth of an acre in extent ; and the company reserve the right to refuse such permission.

87.—Water-closets must not be used in connection with cesspools, except in the case of isolated buildings, by special arrangement with the company.

88.—Where Dr. Poore's system is adopted it shall be carried out to the satisfaction of the company, and be kept in good working order.

The company reserve the right to call for the repair or the discontinuance and removal of the system at any time if it is found to be a nuisance.

MATERIALS

115.—Every person who shall erect a new building shall use sound and proper materials and workmanship of good quality approved by the company.

- (a) He shall take all responsibility for the quality of materials wherever obtained.
(b) In case of doubts arising as to the quality or character of any work already covered up, he shall accede to any request made by the company to expose such work. Where such work shall, upon being exposed, prove to be in accordance with these regulations and to the satisfaction of the company, the reasonable expense of exposing that work shall be borne by the company, but in all other cases the expense shall be borne by the lessee.

PLASTERING

116.—The plastering to be placed on any wall of any new building shall be composed of cement, lime, or other suitable materials, and clean, sharp sand with a sufficient quantity of clean cowhair, and shall be mixed in the

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proportion of not more than three parts by measure of sand to one part of cement or lime.

117.—External plaster or roughcast should be composed of good Portland cement, good lias lime, or other suitable materials of damp-resisting properties, and must be mixed in the proportion of not more than three parts of sand or other suitable material to one part of cement. If comprised of lias lime, shall be mixed in the proportion of one part of lime to not more than two parts of clean sharp sand, and where gault bricks, flinton bricks, or other smooth-faced bricks are used in walls intended to be covered with roughcast or plaster the bricks must be made with a key or otherwise roughened to give adequate hold to the plaster, and in every wall not less than one brick in every three shall be so keyed, slotted, or roughened to the satisfaction of the company.

TIMBER

118.—All timber used in the construction of any building must be sound and of good quality.

119.—In all cases where the ends of ground floor joists, or where the plates on which they rest, come within nine inches of the external face of an outer wall, unless such outer face is covered with a coating of cement plaster at least three-quarters of an inch thick, the ends or plates must be creosoted, tarred, or otherwise protected.

FLOORS

121.—Any person who shall erect a domestic building, and shall construct a floor in the ordinary manner, with joists laid on edge at a distance apart not exceeding 15 inches measured from centre to centre, shall use timber of good quality, and shall cause every common bearing joist to be of a strength not less than that indicated in the following table :

Length of bearing in ft.	Depth in inches when the breadth is			
	2 ins.	2½ ins.	3 ins.	4 ins.
Not exceeding 5 ft.	4	—	—	—
" 6	4½	4	—	—
" 8	5½	5	4½	—
" 9	6	5½	5	—
" 10	6½	6	5½	—
" 11	7	6½	6	—
" 12	8	7	6½	—
" 13	9	8	7	—
" 14	10	9	8	7
" 16	11	10	9	8
" 18	—	11	10	9
" 20	—	—	11	10
" 24	—	—	—	11

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Provided that :

- (a) The thickness of a trimmer joist receiving three common joists, and of a trimming joist receiving such a trimmer at not more than three feet from one end, shall be one-half inch greater than the thickness prescribed for a common joist, and that an additional half-inch shall be added for every three or less than three additional common joists carried by the trimmer, and that all trimmings shall be properly framed.
- (b) The floor joists of every public building shall be not less than twenty-five per cent. stronger than the strength indicated in the above table.
- (c) The floor joists of every building of the warehouse class, intended for the storage of goods, shall be not less than fifty per cent. stronger than the strength indicated in the above table, and may be required to be of greater strength when the purpose for which the building is intended seems to demand it.
- (d) The spacing and section of the joists may be varied provided that the strength of the floor is at least equal to the strength of the floor prescribed in the above table.
- (e) In the case of floors of unusual character they shall be so made that the strength of the floor shall be at least equal to that prescribed for an ordinary floor of the same class.
- (f) In the case of a loft or attic floor, where the company are satisfied that the ordinary strength is not required, some slight reduction on the standard sizes may be allowed.
- (g) All joists exceeding ten feet in span shall have approved bridging wherever the construction of the floors renders this possible. Where the bridging is omitted additional strength must be provided.
- (h) In calculating the size and strength of any joist, beam, or other bearing timber, when the depth is at least equal to the breadth for the purpose of comparison, the depth in inches shall be multiplied by itself, and the product shall be multiplied by the breadth in inches, and the number thus obtained shall be deemed to represent the strength of such beam.
- (i) Where ceiling beams are used they must be of adequate strength to support any superincumbent weight.

FLOOR BOARDS

122.—Every person who shall erect a new building, and shall cover the floor of such building with floor boards in the usual way, shall, except where such floor boards are laid upon some impervious substance, cause such floor boards to be rebated or tongued, and to be of not less than seven-eighths of an inch finished thickness.

ROOFS

123.—Where the angle of a roof is 45 degrees with the horizontal the lap of the tiles shall be three inches, where less than 45 degrees the lap shall be three and a quarter inches. Where the angle of the roof is 50 degrees or steeper than 50 degrees the lap may be two and three-quarter inches or two

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and a half inches if the roof is boarded. Roofs flatter than 45 degrees will not usually be allowed. With exceptionally close fitting tiles an angle of $42\frac{1}{2}$ degrees may be approved in certain cases, and where roofs are boarded an angle of 40 degrees may be approved. A manhole with hinged trap-door of not less size than twelve inches by twenty-four inches must be placed in the ceiling of every house so as to admit of inspection of every part of the roof.

123A.—Every person who shall erect a new building and shall construct the roof of such building of timber in the ordinary manner with common rafters and purlins set on edge, shall use timber of good quality and shall cause every common rafter to be of a strength not less than that indicated in the following table, the rafters being spaced not more than fifteen inches apart, measured from centre to centre.

Length of bearing.	Dimensions of rafters.
Not exceeding 5 ft.	3 in. by 2 in.
" " 6 "	$3\frac{1}{2}$ " 2 "
" " 7 "	4 " 2 "
" " 8 "	$4\frac{1}{2}$ " 2 " or 4 in. by $2\frac{1}{2}$ in.
" " 9 "	5 " 2 " " $4\frac{1}{2}$ " $2\frac{1}{2}$ "

124.—He shall cause every purlin to be of a strength not less than that indicated by the following table :

Length or span of purlins between adequate supports.	Distance apart.		
	Not exceeding 5 ft. 0 in.	Not exceeding 7 ft. 0 in.	Not exceeding 9 ft. 0 in.
ft. in.	in. in.	in. in.	in. in.
6 0	$4\frac{1}{2}$ by 3	$5\frac{1}{2}$ by 3	6 by 3
8 0	7 " $2\frac{1}{2}$	7 " 3	7 " 4
10 0	7 " $3\frac{1}{2}$	9 " 3	9 " 4
12 0	9 " 3	9 " 4	9 " 5
14 0	9 " 4	11 " 4	11 " 5
16 0	10 " 4	11 " 5	11 " 6
18 0	10 " 5	11 " 6	12 " $6\frac{1}{2}$

Provided that :

- (a) When the common rafters are trimmed between the supports adequate additional strength shall be provided.
- (b) The length of the purlins shall be deemed to be determined by cross walls, by properly framed trusses of adequate strength, by hip rafters and valley rafters of adequate strength and of sufficient depth to properly receive and support the ends of purlins, or by wood partitions if properly framed, braced, and supported ; but light

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studded partitions resting on ordinary joists shall not be deemed sufficient to determine the length of a purlin.

- (c) Where the common rafters are properly supported with collars and struts and adequate provision by ties or otherwise is made to take the thrust at the feet of the rafters to the satisfaction of the company, roofs other than roofs carried on purlins may be accepted.
- (d) The spacing and sections of roof timbers may be varied from those given in the tables, provided that the strength of the roof is at least equal in every part to the strength as prescribed in the tables.
- (e) In calculating the size and strength of any purlin, beam, or other bearing timber when the depth is at least equal to the breadth, for the purpose of comparison the depth in inches shall be multiplied by itself, and the product shall be multiplied by the breadth in inches, and the number thus obtained shall be deemed to represent the strength of such beam.

(II.) THE FORM OF LEASE GRANTED AT GARDEN CITY

THE lease of the Garden City Company is in a particularly simple form, and contains only one or two clauses of unusual interest ; these clauses are given below. The other clauses provide for the payment of rent, the user, insurance, and maintenance of the premises, and other formal matters.

The lessee covenants :

2.—On or before the _____ day of _____ to build within the said building area to the approval of the architect or surveyor of the company in a good substantial and workmanlike manner with sound and proper materials a _____ of the cost value of _____ with all proper outbuildings and offices drains sewers and connections with sewers (if and when such sewers are provided) boundary walls and fences or hedges (where marked with a T on the said plan and of a kind approved by the company) in conformity with the building regulations of the company for the time being in force upon the Garden City Estate and in accordance with plans elevations sections and specifications to be approved by the said architect and surveyor and to pay and discharge the fees and charges of all local or other authorities and their surveyors and by means of vouchers or other reasonable evidence when required satisfy the company or its architect or surveyor that the said sum of _____ has been expended on such _____.

11.—(iv.) Not without the consent in writing of the company to use the premises for the purpose of advertising or to display or permit to be displayed thereon any advertisement or name plate and to remove and discontinue the use of any advertisements to which the company may take objection.

N.B.—For example, the company do not propose to permit sky-line or green field advertisements or some forms of illuminated advertisements.

Appendix K

12.—Not to erect or suffer to remain upon the premises any building or erection other than that stipulated for in Clause 2 hereof without the previous consent in writing of the company and to maintain and observe any building lines and the building area shown upon the said plan or plans.

15.—Not to permit any building or any part thereof upon the premises to be occupied by day or night by such a number of persons as shall reduce the air space available for each individual over ten years of age below five hundred cubic feet or for each child under that age below two hundred and fifty cubic feet.

16.—To construct every furnace employed in the working of engines by steam and every other furnace employed in any factory or other building on the premises so as to consume or burn the smoke arising from such furnace and not to negligently use any such furnace so that the smoke arising therefrom is not effectually consumed or burnt nor to cause any noxious or offensive effluvia without using the best practicable means for preventing or counteracting such effluvia.

17.—Throughout the said term to execute all such works and observe all such building sanitary and other regulations as shall for the time being be in force in respect of or apply to the premises whether of the company or under the Public Health Acts or otherwise. And in the case of factories or workshops to observe the provisions of the Acts relating to Factories and Workshops 1891-1901 inclusive or such of them as may be in operation at the date hereof and of any future statutory modifications thereof or additions thereto or any regulations of any municipal local or other authority.

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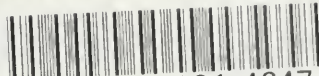
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